

Children's Newspaper

Starving Men in a Realm of Plenty
See My Magazine—the C.N. Monthly for May

The CHILDREN'S NEWSPAPER

AND CHILDREN'S PICTORIAL

The Story of the World Today for the Men and Women of Tomorrow

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EDITED BY ARTHUR MEE

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ARE BRITONS GROWING SHORTER?

THE PIT PONIES PATIENT ANIMALS THAT HELP THE MINERS

Living Always in the Dark
PONY BORN IN A COAL MINE

By a Correspondent

Everyone was glad when the news came that, whatever might happen to the mines, at least the pit ponies would be saved.

A few years before the war I went down the deepest mine in South Wales, and there made acquaintance with numbers of ponies and one of the men who look after them. These ponies seemed to me as big as cart-horses, and for a time I could not believe they were veritable ponies. I was a victim of "relativity." In their stalls, which are very narrow, and under the roof of coal, which is very low, they looked immense.

Where Lamps Burned Dimly

The scene was romantic. We had been crouching our heads as we stumbled along in a tunnel laid with lines for coal trucks, and had been driven once or twice into narrow refuges in the sides of the tunnel as a truck came swinging and roaring through the gloom. Then, of a sudden, we found ourselves able to stand upright in an open space.

The lamps burned dimly. It was like a big church lighted by a single candle. Presently, my eyes becoming used to the darkness, I saw a number of horses in the side of the rock. Their tails were close to me, and from their heads came the noise of rack chains and the munching of oats.

Something ran under the legs of one of these ponies. It was a mouse! I spoke about it. "Oh, we get plenty of mice down here!" I was told.

And soon I saw that the whole stable was like a playground for mice. They ran up the sides of the rock, disappeared into the manger, dropped out of the hay sacks, flashed in and out of the ponies' legs, and scampered across the straw from one stall to another.

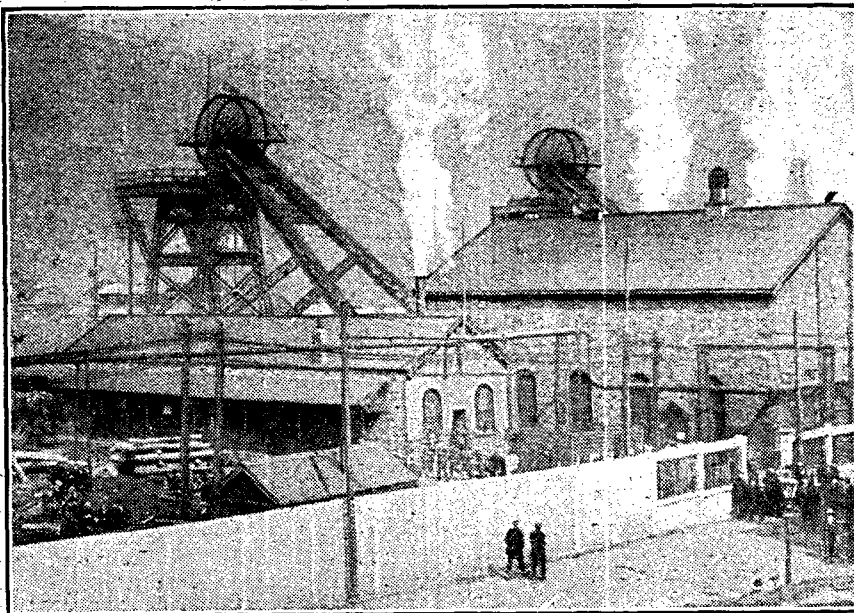
The Kind Old Man

I spoke to the man in charge of the ponies. He had one of the kindest and gentlest faces I have ever seen. The distinguishing expression of this kind and gentle face was its patience. He had been in the pits since a boy, had grown too old to work at the coal face, had suffered a bad accident, and was now in charge of these ponies.

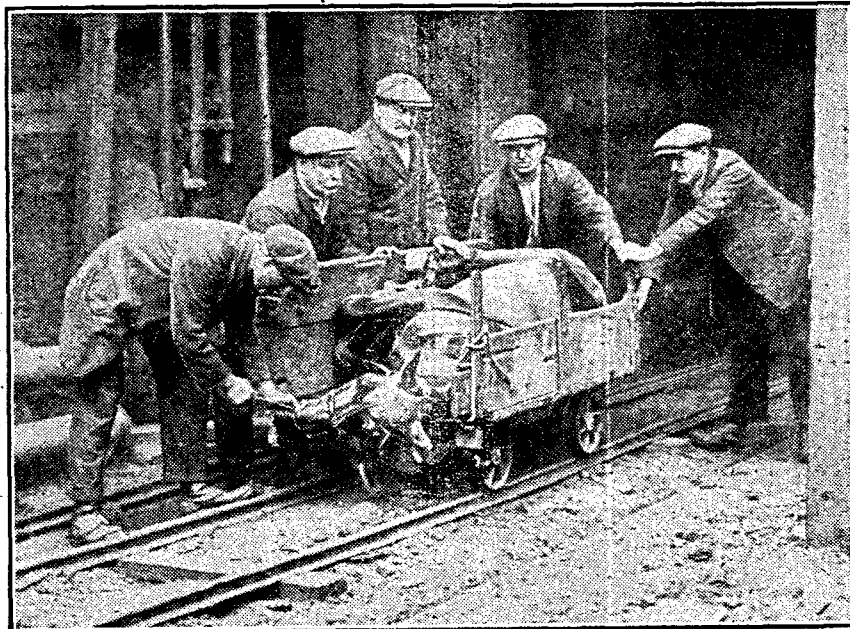
Life had denied him many years of sunshine. But he was not bitter. He was kind to the ponies, but was not sorry for them. He looked after them well, but could waste no sentiment on their hard lot. Like men, some animals must put up with more rough than smooth. Somebody's got to do the work.

He assured me the ponies get used to their life in the pits. They are very

The Top and Bottom of a Coal Mine



A general view of the outside of a coal mine, showing the winding apparatus for the pit



The bottom of a coal mine, with a pit pony about to be sent to the surface. See next column

good-tempered, eat well, and pull in the traces as if they enjoyed the work.

But to live always underground! Never to run in a green field! Never to see the sun! The old man smiled.

"Ah, they get used to it!" he said. Had he got any favourites? I inquired. Well, he tried to treat all alike; but yes, he supposed he had one or two he liked more than others. He had names for them, and I am sure he talked to them when no one was by.

It was when I praised their condition that his face showed real pleasure. It was then, too, that I discovered his pride in his ponies and his love for them. He spoke of their characters. "We try to make them happy," he said.

I am sure this old collier was glad, quietly and unemotionally glad, when his pit ponies came up to the surface and were saved from the starvation and drowning that might have been their lot.

I think the old collier would under-

stand, for all his patience and calm, the cry in Ralph Hodgson's beautiful poem:

'Twould ring the bells of Heaven
The wildest peal for years,
If parson lost his senses,
And people came to theirs,
And he and they together
Knelt down with angry prayers
For tamed and shabby tigers,
And dancing dogs and bears,
And wretched, blind pit ponies,
And little hunted hares.

Anyone has only to see the ponies "turned out to grass" when they have been brought up the shaft to understand how real is their joy in seeing the once-familiar earth again. They caper and gallop round, and do not know how to express their delight as memory revives.

Only a few weeks ago a pony was born in a pit of the Astley Colliery, and might never have seen daylight had it not been for the strike, which caused it to be brought to the surface. Picture on page 12

THE SECRET OF A TENNIS LAWN

RARE FIND NEAR LONDON
Roman Lady's Scent Bottle in
an English Garden

THUMB PRINT 1800 YEARS OLD

Eighteen hundred years ago, when Trajan, Emperor of Rome, ruled the known world, the Roman victors in Britain had a settlement at what we now call Welwyn, in Hertfordshire, about 20 miles from London, and attached to the settlement was a cemetery. The Romans passed away, and with them all recollection of their fair city in Hertfordshire. The cemetery, too, was forgotten.

But now Major G. M. Kindersley, making alterations in his garden, finds relics of that cemetery under his tennis lawn, and has made discoveries which afford us hope that future work on the site will reveal important evidence of the life and manners of that old mingling of Roman and British peoples and customs in the long ago.

A Roman Beauty

Last week we read of the discovery of a Scandinavian woman; now we have details of the finding in this tennis lawn of the grave of a woman whose statue and possessions, buried with her, indicate that she was a Roman lady of rank in those historic days.

There is her effigy, an exquisite bust eight inches high, showing the features of a Roman beauty. The statuette had been wrapped in some fabric now perished; it was draped, it was decorated with a bronze necklace, and with it in her grave came to light old jewellery of bronze and blue enamel, vessels of fine glass, including one in which, apparently, the lady carried her perfumes.

Potter's Tell-Tale Mark

Other relics are Roman ware with the names of the makers on the pieces—Divinatus, Centussa and Albuci. Some of them are very valuable, but other things are of the coarser type which the Britons, forsaking native art and copying Roman, produced during the days of changing culture.

The potter left the mark of his thumb upon the wet clay of some of the pieces, and there it is, fixed and set, after 1800 years in the earth; while some of the ware shows signs of having been broken and riveted all that long while ago.

Experts decide that the burial took place in about the year 100 A.D., so that the woman lived through days rendered notable for us by the acts of Caractacus, the proud, conquered British king who, when they carried him captive to Rome, looked upon the splendours of that city, and exclaimed in wonder, "and yet the owners of all this must needs covet our poor huts in Britain;" and of Boadicea, the "warrior-queen."

GREAT MECHANICAL GENIUS

THE RAT AND ITS WAYS
How it will Baffle Us Whatever We Do

REASONING THINGS OUT

By Our Natural Historian

We are to have more and more Rat Weeks, in which we are all to be called on to unite in a great crusade against an animal that, in India alone, has during the last 20 years caused damage amounting to £400,000,000.

As a matter of fact, these Rat Weeks are a confession of failure on our part, for we have now an Act of Parliament making it compulsory for people to keep their property free from rats and mice. Why not enforce this Act?

We destroy rats for a week, and then leave the survivors alone for months. Now, the progeny from one pair of rats, if all survive, numbers 800. Of what use is it to kill a few scores of these in a week and then permit the remainder to multiply?

Sharpening Their Wits

It is in vain that we buy one or two rat-traps, and think that by setting these we have conquered our wily enemy. The rat is a mechanical genius, and after the trap has been operated for a night or two the rest will not go near it. Traps must be constantly altered, and that is more than poor people can afford to do. Better and more scientific methods are needed.

Rats come nearer to us than any member of the rodent family, mice alone excepted, and they get their wits sharpened by long experience. We have seen a trap set in a hole in a fence through which they ran, and after two or three nights have seen the old run avoided and a new hole made in the fence near the old one.

Leaping Over the Barriers

It was for long a marvel how rats could get from ships to port when the vessels were anchored a cable's length away from the dock and deep water intervened. We learned that the little acrobats ran along the cables from the ship to the land. Large discs were, therefore, fixed on the mooring ropes, and that succeeded for a time; but a race of rats arose which overcame the discs, leaping or climbing over them, and continuing their way to shore.

Doubtless many were drowned in the attempt; but the successful rats were enough to bring disease and damage in their train. So now ships' cables have to be tarred, or they are whitewashed and watched with lights thrown on them.

Yet somehow the rodents do get in. Only the other day we had cases of plague in one of our ports, which was traced to a cat which had killed a rat and collected its fleas.

Thinking it Over?

Rats can swim; they can climb; they can tunnel. We used to watch them at an old water-mill where corn was ground in Essex. When rain fell they would climb on to the roof to drink. When the weather was dry they would not risk an approach to the river in the open; they scrambled on to the roof, descended a pipe that carried the rain down from the tiles into the ground, and emerged by the river just below the dam.

That was their way to water. They would climb down that pipe and so reach the river, and then climb back and reach the topmost storey of the mill. To run out into the open and drink from the river would have taken but a moment, but would have exposed them to cats and dogs and men; so they took the safest way round.

E. A. B.

SPOILING THE COLISEUM

Misuse of a Great Historic Site

PLACE WHERE MARTYRS FELL

Of all the ruinous sites in the world the most famous and impressive is the Coliseum at Rome.

That huge amphitheatre, still dignified in its decay, is the finest relic of Rome as she was in the days of her mastery over the civilised world; and it is sacred also in Christian thought because it was the scene of martyrdoms when early Christianity rose steadily into power through bitter persecution.

To the tens of thousands of pilgrims who journey yearly to Rome from every quarter of the globe—men of all forms of Christian faith—the Coliseum is the survival from the far-off past which they most eagerly wish to see and most clearly remember.

Home of the Gladiators

And yet the announcement was made that the Italian Government had consented to let the place by contract for four years to—a theatrical company for plays or cinema exhibitions!

Not even the Goths who sacked Rome in the days of her downfall ever conceived a more monstrous sacrilege. Imagine the state of feeling of the student of Rome in the great days of old arriving to feel again the spirit of the vanished ages in that great roofless Hall of Time, the home of gladiators, and finding a common cinema!

Happily, the people of Rome have risen promptly to a sense of the fitness of things, and have raised such powerful protests that the scheme has been hastily abandoned.

But who can have been the dull-souled men who even for a moment allowed such a desecration to be entertained as a possibility?

"When falls the Coliseum Rome shall fall" ran the old prophecy. That final fall would have come, indeed, if Rome had ever been foolish enough to allow her solemn arena to be changed into a cheap stage show.

GREECE FINDS TROUBLE

Mistakes of a Headstrong People

The world looks back at Greece as once the wisest nation that ever existed, but that was more than 2000 years ago. Now Greece has changed into the most unwise of nations.

Because of what Greece once was it has been favoured among the nations and forgiven for its follies, but it still goes on acting unwisely.

Its last folly was to restart war with Turkey on its own account to escape a peace settlement which the Allies, its friends, were recommending.

Everyone who has watched recent history knows, and Greece has had many chances of knowing, that in war Greece is no match for Turkey. The individual Greek cannot be trusted as a soldier in a dangerous position.

Yet the Greeks suddenly flung themselves on the Turks in a part of Asia Minor that was the natural home of the Turkish people, and to which the Greeks have no claim.

This movement, wrong in itself and without any promise of success, has been swiftly crushed by the Turks, and Constantine, the king whom Greece would have back from exile, is loosing for Greece the gains M. Venizelos, whom Greece threw aside, secured for her.

Greece has been made a pet of by the Great Powers and has not deserved it, and if she is left to her own headstrong and foolish ways she will crumble back into her former insignificance.

But what can be done with nations that are rash and headstrong and have lost their wisdom?

PEACE AT LAST

America to Settle Up With Germany

HOPE FOR THE FUTURE

The American Republic is still in a state of war with Germany, though hostilities ceased two and a half years ago, and one of the first actions of President Harding's new government when it gets to work will be to conclude peace in proper form.

The American people do not agree with the terms of the Peace Treaty made by the Allied Powers, though their late President agreed with what was done. They have turned their backs on President Wilson and have disowned his acts. So now they must make a peace on their own account.

But that does not mean that the Republic is favourable to Germany, or will in any way support her when she tries to slip out of her debts.

The American Republic has always remained apart from the rest of the nations in her state of mind, and wishes to be independent in her thinking and not too closely mixed up with the disputes of the countries of the Eastern Hemisphere.

They think President Wilson would have been better placed if he had been looking at the affairs of all the nations from the other side of the Atlantic instead of arguing them in Paris.

So they will now proceed to make peace with Germany in their own way; and then, we may hope, they will bring their independent and detached judgment to bear in their own way on questions of future peace between the nations, and so take a part, even if it be a somewhat distant part, in the wiser government of the world.

CAN ANIMALS THINK?

Difference Between Reason and Instinct

A thirteen-year-old lassie, from the neighbourhood of Manchester, writes as follows on the question Can animals think?

When a pet animal does a very clever trick it does not think what it is doing, but only does what it has probably done many times, and what has become a habit, or an instinct, and there is a difference between a thought and an instinct.

If we seize a red-hot poker we naturally let it drop; we do not say to ourselves: "This poker is hot, it is burning my fingers. What shall I do with it? I think I'll drop it."

We drop it because it is an instinct to do so. And when animals do things that seem clever often they become habits, or a kind of instinct, and are not thought out. Though there are no important proofs that animals do not think, there are no proofs that they do.

FACING THE SOUTH POLE

Captain Scott's Statue in New Zealand

A reader who lives in Christchurch, New Zealand, writes:

There is a statue here of Captain Scott, who went to explore the South Pole and never returned.

He stands facing the South Pole, and at night headlights from the hotel opposite are lighted and fall full on his face, lighting it up in a striking way.

It is a beautiful statue, and looks best in the dark. Captain Scott's own wife made it.

Pronunciations in this Paper

Bayard	Bay-erd
Boadicea	Bo-a-de-see-ah
Caractacus	Ka-rak-ta-kus
Coliseum	Kol-e-see-um
Cowper	Koo-per
Helsingfors	Hel-sing-fors
Paraselenae	Par-ah-see-lee-nee

POWER OF A PLANT

VEGETABLE MARROW THAT LIFTED A CART

A Forceful Cucumber

BEECH TREE STRANGLED BY HONEYSUCKLE

A correspondent of the C.N. writes to say that he put one of the growing pears on a tree in his garden into a square glass bottle, which he fixed against the wall. He then watched from day to day to see what would happen.

Gradually it filled the bottle, flattening itself against the square sides, and at last burst the glass walls of its prison.

Our correspondent, Mr. John Stone of Clacton, thinks this was a wonderful exhibition of force on the part of the pear, and he is right. Wherever there is life there is power, and the marvels which the soft, growing tissues of a plant can perform are almost incredible.

Some time ago a heavy pavingstone began to rise on a pathway in a country town, and when it was removed to see what had caused the disturbance a mushroom was found growing underneath. Soft and pliable as the fungus might seem, it was more powerful than the dead weight of the stone, which must have been half a hundredweight.

An Unfortunate Marrow-Bone

Enormous weights have been lifted by vegetable marrows. Some years ago one which was growing under an old disused cart, from which the wheels had been removed, actually raised this from the ground. Cucumbers, too, have performed prodigies of valour. One young cucumber found its way when very young and thin through the middle of a large marrow-bone, and as it grew larger and larger the inexhaustible force which it exerted split the bone.

It is difficult to realise what power the growing cells possess. At Trevena, in Cornwall, a hawthorn tree growing out of a massive block of rock has broken this up into fragments; and a large stone tomb at Tewin, in Herefordshire, has been burst in the same way by an ash and a sycamore, which when young had entered the stonework.

Tree Lifts a Ton

At one place in the Tyrol the roots of a larch grew downward through a cleft, and as the root thickened it split the stone, and raised part of it, weighing more than a ton, a distance of a foot. At Cambridge, in one of the main streets, there is an iron fence which has been absorbed by a growing tree, so that several of the massive iron uprights have disappeared inside the trunk. It was either this or destruction for the fence.

The only thing that some of these trees cannot resist is the strangle grip of another plant that encircles them. In England honeysuckles often kill a tree like the beech, while in tropical forests many of the creepers kill the trees up which they climb, and then save themselves from falling by throwing out long branches to neighbouring trees.

Even the fine threads of lichens, the lowliest of the plants, penetrate the tiny crevices of rocks and break these up to form soil for higher plants.

Force of Rising Sap

The tiny root hairs of our common wild plants, though so fine as scarcely to be seen, push the particles of earth and the stones on one side and penetrate into the soil like a gimlet. Experiments have been made with beans which have been grown in water spread over quicksilver, and the roots have been found actually to force their way through this heavy metal.

The runners of couch grass habitually bore through the roots of trees, and will even penetrate discs of tin-foil.

Another wonderful instance of the power of a growing plant is the way in which the sap is pumped up to the remotest leaves. The force of the rising sap has been found to be equal to a pressure of 22 pounds.

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HOW HIGH DO BIRDS FLY?

Flocks Seen Two Miles Up ASTRONOMERS ON THE WATCH

Some birds, such as larks, finches, buntings, starlings, and thrushes, fly in flocks from one part of the country to another in their partial migrations, and one sometimes sees a great troupe crossing the sea no higher above the level of the water than the rigging of a ship is, and looking like a cloud of smoke.

But this is not the way with the majority of migratory birds; most of them fly fairly high. Even the wild geese, whose flying phalanx we see so plainly, and hear as well, go northward at a very considerable height.

Some astronomers have seen birds at night crossing between their telescopes and the moon's disc, and have estimated their elevation at nearly two miles.

The best observations in the past have pointed to the conclusion that it is very unusual for birds to migrate at altitudes greater than 3000 feet, and that they tend to keep below the lowest clouds.

Kestrels in East Africa

It is not obvious why they should seek to go higher, into levels where it is colder and where it is more difficult to breathe.

Some new evidence has just been submitted by Colonel R. Meinertzhagen, D.S.O., as to the altitude of migratory flight. He obtained much information from pilots of aircraft.

On one occasion, when he was himself flying over the southern slopes of Kilimanjaro, in East Africa, he encountered a large, scattered flock of lesser kestrels and bee-eaters making their way north 5200 feet above the slopes of the hills.

During the war he made numerous observations by the use of theodolites on a wide base. The most striking general result of observations both in the air and from the ground is that flight at anything like 5000 feet is very unusual, and that the bulk of migratory birds fly below 5000 feet by day and by night.

There are high-fliers, like lapwings, geese, cranes, and rooks, and there are low-fliers, like swallows and wagtails, but when the weather is bad, especially when it is cloudy, all birds fly low.

A FORGOTTEN TREASURE

Picture Revealed by a Ray of Light

The interesting things hidden away in London are so many that no one can find them all. Sometimes they come to light in strange ways.

The latest example is the discovery in an old church, St. Mary Abchurch, built by Sir Christopher Wren, of a beautiful ceiling painted by Sir James Thornhill, a Dorsetshire man, who in the reigns of Queen Anne and George I was a fashionable decorative painter.

He it was who first painted the inside of the dome of St. Paul's Cathedral—paintings now destroyed. The royal palaces of Hampton Court, Greenwich, and Windsor were decorated by him, and many great mansions in the country, such as Blenheim and Chatsworth.

Thornhill was an artist of real distinction, but his work, being chiefly decorative and depending on the duration of perishable buildings, has been spoiled by time to a large extent.

This makes the discovery of a good example of it after a lapse of 200 years the more remarkable and valuable.

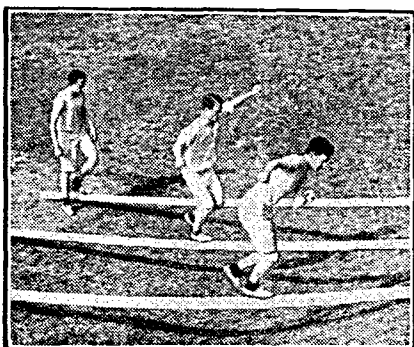
A beam supporting the roof of St. Mary Abchurch having fallen, a shaft of light was let in, and there appeared a beautiful, painted ceiling.

A ring of electric lights has now been placed high up in the roof, and twentieth-century visitors can see the work of this famous English decorative artist.

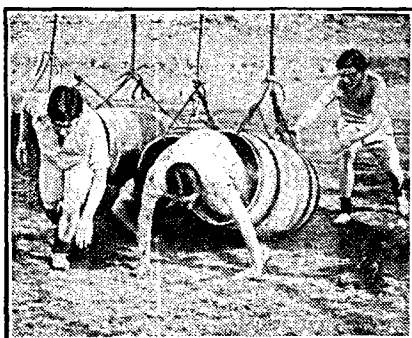
SCHOOLBOYS IN AN OBSTACLE RACE



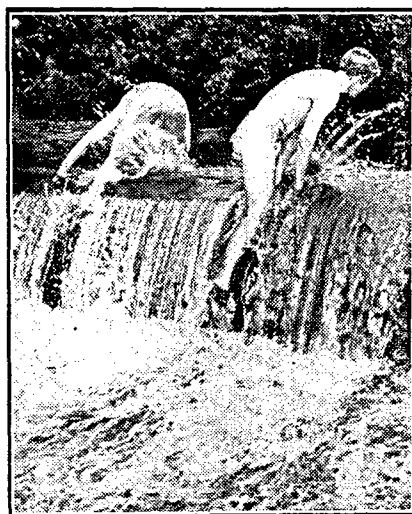
The winner making his way through the stream



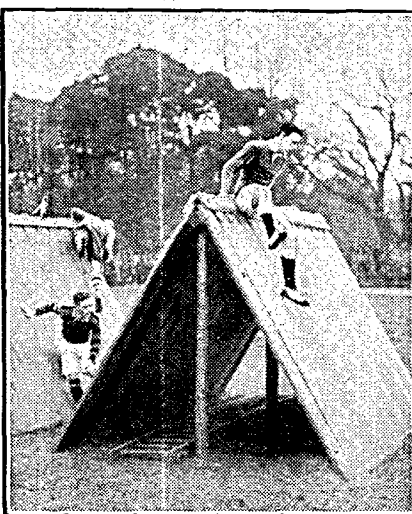
Walking the plank



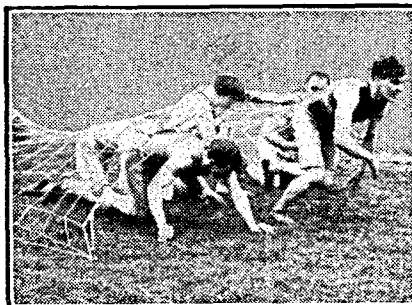
Through the barrels



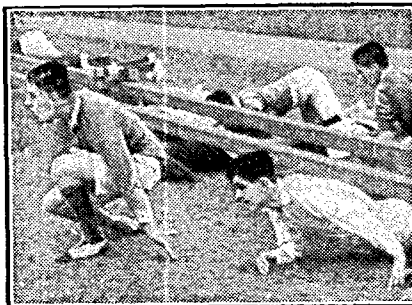
Climbing the weir



Over the gables



Through the nets



Under the bars



A competitor falls at the last fence

The fine weather which has prevailed recently helped to make the athletic sports of the public schools and colleges a great success. In these pictures of schoolboys and students in obstacle races, the fifth and seventh pictures show Sandhurst cadets, the sixth picture a race at Stamford Bridge, and the others the boys of Bradfield College

COLDER THAN THE MOON

LIFE IN THE GREAT WHITE SOUTH

Registering 108 Degrees of Frost

WHY MAN IS MASTER OF THE EARTH

The great white South holds the bones of Captain Scott and his gallant comrades, Wilson, Bowers, Oates, and Evans.

Shackleton, after seemingly impossible adventures and escapes upon and around the land, is to go there no more. He is off to the sheeted North, where he may meet a Scandinavian expedition which is faring forth to learn more of those mysterious, pale-faced, golden-haired Eskimos whom the Canadian Stefansson first discovered a few years ago.

Meanwhile the Antarctic is left to the faithful dead and to the scientists who are working out results.

There is still something for us to learn from the labours of these men who risked all and won through, or died on the scene of their adventures.

The Terrible Antarctic

Dr. George Simpson, director of our Meteorological Office, has recently held a scientific audience spellbound with some of the facts he has brought together from the expeditions of Scott and Shackleton and others.

This astounding fact emerges—that the great central plateau of the Antarctic continent is colder than the moon—not colder than the moon at that orb's coldest, but colder when Antarctica is hottest, so to speak, than the moon is when its own temperature is highest.

Science declares that the surface temperature of the moon when it receives most light and heat from the sun equals the freezing point of water. Antarctica, where Scott lies dead, never does.

In Tents with 72 Degrees of Frost

Midsummer in that dreadful land means a temperature of 52 degrees Fahrenheit below freezing point! Ross Island, off the coast to which our men sail, has only once been known to rise above freezing point in summer, and then only for an hour or two in the afternoon. On the mainland Birdie Bowers and Dr. Wilson, now sleeping their last long sleep beside Scott, lived in tents during 72 degrees of frost.

Of course they could not sleep in it—no man, no matter how perfect his accommodation in a tent, could; but they lived in tents through that, and when they were on the move they actually recorded a temperature of 108 degrees below freezing point. That was the lowest temperature ever observed in the history of the world by men living in tents.

Living Through Heat and Cold

Think what that means. Those men who bore that terrible cold would, on their way across the Equator voyaging south, have to endure a temperature of, perhaps, 100 degrees above freezing point. They survived a fluctuation of 200 degrees.

Yet their own blood could not have varied more than a degree or two in heat. It is death to us if the warmth of our blood exceeds 106 or 107 degrees; and we are supposed to be desperately ill if it falls below 94.

Yet these men lived through changes of 200 degrees, keeping their blood cool in the tropical heat and practically at the same degree of warmth in the frigid Antarctic winter.

Need we wonder, in the face of physical marvels such as these, that man has sailed the round world, explored every climate, and made himself master of every habitable place upon the earth?

TOMORROW'S GREAT COUNT

TWO YEARS TO ADD UP THE FIGURES

Big Schools Empty for the Holidays

HOW BOYS AND GIRLS CAN HELP THEIR PARENTS

Tomorrow, Sunday, night the people of the United Kingdom are to be counted, and, although it will take two years for the figures to be properly arranged and tabulated, it is hoped that by June a fairly accurate return will be prepared, showing what the population is.

The census has hitherto been taken every ten years, but an attempt is to be made in future to take a less elaborate census in between the regular counts, so that there will be a census every five years, just as there used to be in ancient Rome. It has been found that the estimates of population made toward the end of a ten years' period are very untrustworthy.

It was really a distrust of estimated figures that led to the first regular census in Britain in 1801. A member of the House of Commons pointed out that the estimates of the population varied between eight and 11 millions, but when the count was actually made the population of the United Kingdom was found to be 15,717,287, or about double the lowest estimate.

First British Census

Although the census of 1801 was the first British census of modern times, there had evidently been a count more than fifteen hundred years earlier, for Dion Cassius, the historian, tells us that a poll tax was levied in Britain on every man, woman, and child in the population, and before that could be done a census would certainly have had to be taken, just as was the case in Palestine at the time that Jesus was born.

This year the census is being taken about three weeks later in the year than usual, and as the big public schools are having their holidays, which is not usually the case at the time of a census, the population of places like Eton and Harrow will be considerably affected.

Everybody to be Counted

The boys will be counted at their homes instead of at their schools, and, as there are over a thousand scholars at Eton, the town will appear with that number short of its normal population.

In London and other places the school children have been taught how the census paper should be filled in, and no doubt in many homes their help will be sought by parents who have little experience in writing.

At the 1911 census the population of England and Wales was 36,070,492, and it is anticipated that, in spite of war losses, the figures this year will show an increase of at least two millions.

Everybody is counted, including gipsies in caravans, tent dwellers, and tramps, the last-named being enumerated by the local police. In 1911 Lancashire was the county with the largest number of homeless people, 1889, and Kent came next with 1801. Westmorland, with 20, and Rutland, with 18, had fewest.

Recognising the Mothers

The total cost of the present census will be half a million pounds, as against £237,000 in 1911, the higher cost of wages and paper and printing being the cause. Eleven million forms have been distributed to heads of households in England and two million in Wales, but altogether, for the whole of the United Kingdom, 38,000,000 forms have been printed to cover all emergencies. The penalty for wilfully giving false information has been raised from £5 to £10.

In 1911 papers were prepared in both German and Yiddish for the use of aliens, but this year the only "foreign"

Continued in the next column

SIR WALTER SCOTT'S POSTBAG

5000 Letters for Sale

LORD BYRON'S APOLOGY

Everyone who is famous receives many letters from friends, and more from strangers. No fewer than 5000 letters received by Sir Walter Scott have been kept till now, though 88 years have passed since he died.

Most of them are from men who were important in their day; and now they are being sold by auction.

One of them, of great literary interest, is from Byron.

When he was quite young Byron made fierce and utterly unjust attacks upon Scott, who, had done nothing to offend him.

Here are two of the references to Sir Walter in "Byron's English Bards and Scotch Reviewers."

Lays of Minstrels—may they be the last!—
On half-strung harps whine mournful to the blast.

And think'st thou, Scott, by vain conceit perchance,
On public taste to foist thy stale romance?

And there were many more attacks, equally bitter and unkind. Yet Scott proved himself a real friend to Byron, who, later, wrote to him in one of the letters now made public: "The Satire was written when I was very young and very angry and fully bent on displaying my wrath and wit, and now I am haunted by the ghosts of my wholesale assertions."

A lasting warning, this late repentance, against strong and bitter words!

MILK FOR PUSS

Curious Scene on a Farm

A North of Ireland reader writes:

I notice in the C.N. a paragraph about a farmer milking into a cat's mouth.

In a farmyard near the Giants' Causeway, each evening at milking time three cats and a kitten follow the milkman to the byre, where they sit up in a row, like dogs begging, while the milkman milks into each cat's mouth in turn.

While one cat is receiving its portion the other two are trying frantically to pull the stream of milk into their mouths with their paws.

The kitten is too small to sit up without help, so she places a paw against the cow's leg as a support, and in this way receives her share.

While this is going on an old collie, almost blind with age, trots solemnly into the byre carrying a tin in his mouth, and receives his share.

Continued from the previous column

language recognised is Welsh, 800,000 forms having been printed in that tongue. As Welsh, however, is awkward for some items, the forms in that language will contain certain English words.

The census extends not only to the shores of these islands but to a distance of three miles at sea all round the coasts, and the Admiralty undertakes the numbering of the people on the King's ships, while the Customs officers and coastguards take the merchant marine, and local enumerators attend to small coasting vessels.

For the first time the work of the mother in the home will be recognised, and her occupation will be entered as "home duties." Formerly the hard-working mother was put down as of "no occupation."

Questions as to blindness, deafness, and other afflictions have been dropped.

There are 35,000 paid enumerators who are distributing and collecting the forms, and 400 men and women will be employed for the next two years tabulating the returns. These will work in London, at what was formerly the Lambeth Workhouse, a building that has been acquired for the purpose.

THE SKY AS A DOME

Looking Up from an Aeroplane

We often speak of the arch of the sky or the dome of the sky, but perhaps less often pause to ask what the sky above us really looks like, or what its shape really appears to be to our minds.

But if we did consider the matter we should probably say it looks like a rather flattened arch above us; and on a grey day of completely cloudy sky the surface looks like a flat ceiling bending down to the horizon.

If there are scattered cumulus clouds about these seem like packs of fleecy wool when overhead and packed closer together at the horizon, owing to the effect of perspective, so that once again we get the optical illusion of a curved, but rather a flat curved, roof.

Even on a clear, cloudless day the sky, being rather darker overhead and brighter toward the edges, still keeps up the illusion, though not so strongly.

There is a way of getting rid of this illusion and of viewing the sky as a blue semi-circular dome overhead, as if it were the inner dome of St. Paul's Cathedral. It is by going up in an aeroplane.

Professor Luckiesch, who has been doing so, explains what happens. For the first mile up there is no change; even when the aeroplane mounts above the clouds the vault of the sky still looks flattened, because, though there is a new horizon and the sky is deep, dark blue overhead, it is still brighter at the edges. At four miles high all the flatness disappears, and the sky appears as a dark-blue vault, a perfect hemisphere.

NEST IN A FLOWER-POT

Bird Hatched on a Window Sill

A Glasgow reader tells how he has watched the rearing of an exceptionally early pigeon.

About Christmas a pair of pigeons came to a large flower-pot, partly filled with earth, standing on a window-sill, and began to cover the earth with straw. Then two eggs were laid.

The parent birds took it in turn to sit on the eggs, and the one on the eggs would "coo" to the other when it wished to be relieved.

After about three weeks one of the eggs hatched out during very cold weather. The other egg was broken.

The weather was so cold we did not expect the young one to live; but it did.

Gradually the young one was left more alone, until for some days before it flew the parent birds only came to feed it. The young pigeon was extremely vicious, as were also its parents.

For some days the old birds sat on adjacent window-sills and tried to induce it to fly to them, but it would not. At last it flew off to where the parent birds were calling it, and we have never seen it again.

CANADA'S BIGGEST FARM

A 14-Mile Wheatfield

The largest farm in Canada is situated in Alberta.

Twelve years ago a man named C. S. Noble arrived at what is now the town of Nobleford, in Alberta, with only £200 in cash. Today he farms thirty-five thousand acres of land, and his revenue for the year 1920 was over £250,000.

One wheatfield alone last season covered over fourteen square miles, and averaged forty bushels to the acre. Fifty-six binders were in use at one time during cutting operations.

SOME YEARLY EXPENSES

Education in Britain costs £97,000,000.
Rates amount to £149,000,000.
The interest and expenses of the National Debt cost £345,000,000.
The Nation's Drink Bill is £469,700,000.

THE WEEK IN HISTORY

A GREAT INVENTOR

Earl Who Loved the Children

THE KNIGHT WITHOUT FEAR AND WITHOUT REPROACH

April 24. Edmund Cartwright born at Marnham 1743.
25. William Cowper died at East Dereham . . . 1800
26. David Hume born at Edinburgh 1711
27. Herbert Spencer born at Derby 1820
28. Lord Shaftesbury born in London 1801
29. Women admitted to exams. at Oxford . . . 1884
30. The Chevalier Bayard killed in Italy . . . 1524.

Dr. Edmund Cartwright

INVENTORS spring up in all ranks of society. One of the most useful was a clergyman, who produced his first notable invention when he was 41 years old. Before that he was an Oxford scholar, a country rector, and a poet.

This was Edmund Cartwright, D.D. A visit to Arkwright's mills in Derbyshire, where the spinning jenny was newly at work, gave him the idea of inventing a weaving machine; and, though he had never seen a weaver's handloom, he went home and made a machine that would weave.

It was very clumsy and hard to work at first, but he improved it, and presently, though it ruined him, it made fortunes for many manufacturers.

Later he was even more successful with the invention of a wool-carding machine.

In his closing years Parliament voted Dr. Cartwright £10,000 as a public benefactor, and no man ever more truly deserved a gift from the nation.

The Great Lord Shaftesbury

WHENEVER the name of Lord Shaftesbury is heard, the lord thought of is Anthony Ashley Cooper, seventh earl.

Men of his name before him had occupied exalted public positions; but his work for the poor was so great that it obscured all who went before him.

His work began with the movement under Wilberforce to abolish slavery. Then he took up law reform after the death of Romilly, and helped to lessen the cruel sentences for small offences. The treatment of lunatics was next dealt with.

The long hours worked in mills and factories, the bad treatment of apprentices, the employment of children and women in mines, the cruelty to boy chimney sweeps, and the disgusting state of lodging houses were all exposed, and in a large degree remedied, by movements in which he led.

Then, also, he established institutions that served a fine purpose in their day, and that, in some cases, still exist. Reformatories, ragged schools, working men's institutes, the Y.M.C.A., the Society for Prevention of Cruelty to Animals, the Bible Society, and Missions all had an early and a faithful friend in this great-hearted nobleman, the poor man's earl.

The Chevalier Bayard

IN days of old, when knights were bold, some were famous through Europe for their bravery, and were much dreaded.

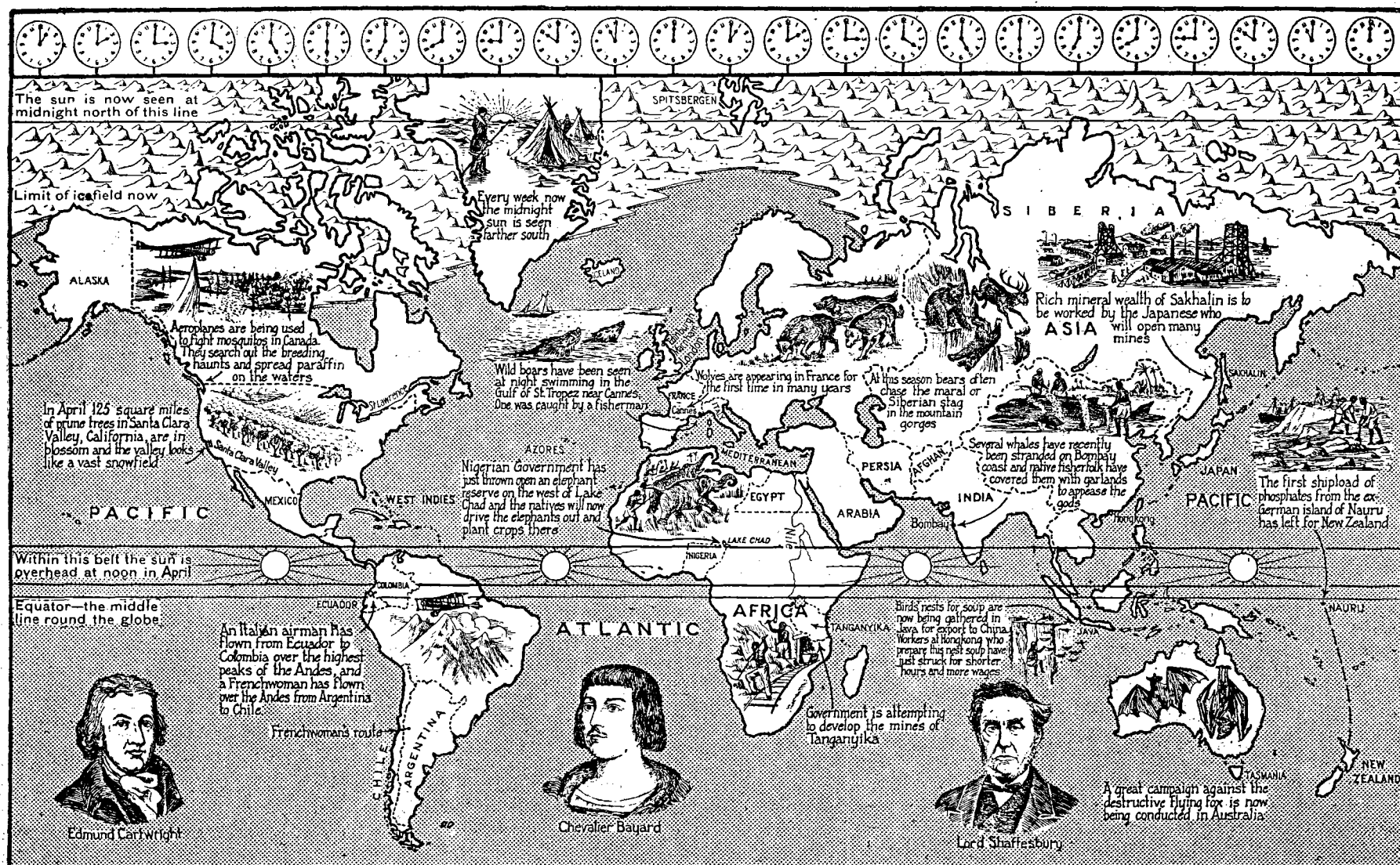
A few were equally well known and deeply admired for a mixture of bravery with courtesy and generous feeling. Highest among them on the roll of fame is the Chevalier Bayard.

He was a Frenchman of Dauphiné. From his youth he was a fighter without ceasing—in Spain, in France, but most of all in Italy, where at last he was slain, shot with a bullet from a then new-fangled gun. Wherever he was engaged he won, the admiration of enemies as much as of friends. Twice he was captured, and each time his enemies released him as a tribute to his character.

When finally he fell a French nobleman on the other side, seeing he was mortally wounded, expressed his sorrow. "Pity is not for me," said the dying knight, "but for you, bearing arms against your country."

The Italians sent his body back in honour to Grenoble, and his name has been preserved as "le chevalier sans peur et sans reproche"—without fear and without reproach.

PICTURE-NEWS AND TIME MAP SHOWING ANIMAL LIFE IN MANY LANDS



THE DAINTY DOG

Traveller's Experience in the Arctic

Dogs, as all know, are very particular about the food they eat, but it will be noticed that before rejecting anything they are offered they always smell it. Therein lies the simple explanation of a dog's likes and dislikes, as has been recently shown by the Norwegian Arctic explorer, Vilhjalmur Stefansson.

Stefansson took with him on a recent exploring trip a team of Eskimo dogs from the Mackenzie River which had been brought up on fish, either fresh or putrid, and on caribou or moose meats in the same condition. When he got into the Arctic with his dogs, he had nothing but seal meat to offer them.

They all refused it while it was fresh; but they became reconciled to it when it went bad. The reason was that the smell when the seal meat was putrid concealed the fact from the dogs that it was strange, unfamiliar food.

Similarly with another team of dogs which had been fed by their Eskimo owners on seal meat, caribou, and fish, there was the same refusal to eat geese, which was the only food that could be given to them in an expedition to the North-East coast of Alaska.

The oddest experience was with wolf-meat. The youngest dogs were the first to give in over this—they starved themselves only for three or four days; but the oldest dog kept up a hunger strike for fourteen days, and indeed remained a conscientious objector to the last, for he would only eat the strange food when it was served to him in rancid seal oil!

IN THE AUCTION ROOMS

The following prices have lately been paid in the auction rooms for objects of interest:

A notebook of Shelley . . .	£1750
Kipling's first poetry book . .	£175
7-leaf pamphlet of Kipling's poetry	£150
A French clock . . .	£105
1d. pamphlet of Kipling's poetry	£50
A copy of Treasure Island . . .	£46

A REAL PRIZE PACKET
Girl's Strange Purchase at a Bazaar

Women are supposed to possess an instinct for a bargain, especially at a sale. A certain young Skegness school-girl, rambling alone among the stalls at a rummage sale bazaar, was attracted by the sight of a neat little box on one of the stalls. She asked the kindly-looking gentleman in charge the price, and was told that she might have it for ninepence.

This sum the girl paid and walked off home with her purchase.

On opening the box she found, to her great surprise, that it contained Treasury notes, silver, and coppers. Had a fairy godfather prepared the gift in anticipation of her coming?

She took nothing for granted, but hustled back to the bazaar and up to the stall from which she had secured her bargain. The gentleman was no longer there, but the lady in whose temporary absence he had been acting was.

The girl showed the box and its contents, and explained that she had given ninepence for it.

"Oh, my dear child," exclaimed the lady stallholder in alarm, "that is the cashbox and contains the entire takings of the bazaar for the day!"

A MONSTER WALNUT TREE

Trunk 36 ft. Round

A reader sends us the following claim to know the whereabouts of the largest walnut tree in England:

In Stoke Newington, Newport Pagnell, Bucks, we have what is supposed to be the largest walnut tree in England.

Some of its branches, which nearly touch the ground, are like trees themselves. One is over ten feet round in the middle.

The trunk near its base is 36 ft. round. The width of the tree from tip to tip of its longest branches is 162 ft.

BIRDS THAT DIG IN THE SAND

Seals Dance Round a Boat

Here is an extract from a letter written home by a British boy out in Australia, giving a glimpse of seaside sights there.

One evening we went to another part of the island to see the mutton birds come in. They always come in at 8.20 p.m.

They dig burrows in the sand as big as rabbit-warrens, and their nesting ground covers ten acres.

They are big, black birds, and just after sunset you see about six come in and fly round for a time. Then hundreds more come up, and the sky is black with them. They make no sound, but fly silently like great black bats.

Another day we went to the seal rocks at the other end of the island. The motor boat rocked a good deal, and I felt rather ill, but it was lovely seeing the hundreds of seals crowding on the rocks.

The minute they saw the boat they plunged into the water and swam out to it, turning head over heels like porpoises in the water.

DOG HELPS A CAT
A Wise Collie

A Scottish reader records an incident of how a dog understood the presence of danger.

In Stonehaven the other day a cat happened to be crossing a street when a lorry appeared sooner than the cat expected, and the cat seemed to be stupefied and not able to move out of the way.

On the pavement was a collie. He seemed to see at once what would happen if no help came. With wonderful sagacity he sprang forward, put his muzzle under the cat, and threw it clear of the lorry.

BIND YOUR C.N.s

You can have your copies of the C.N. bound into handsome volumes. Most back numbers can be supplied, but not all. A postcard to the C.N. Binding Department, 7, Pilgrim Street, Ludgate Hill, E.C. 4, will bring particulars.

BEWARE OF FIGURES

How the Rich City Helps the Poor Districts

GETTING AT THE REAL TRUTH

Whoever wishes to get at the truth should be very careful in the examination of any statements in which figures are used as proofs, for it is a fact that figures may be juggled with so as to seem to prove anything.

The latest instance of a misuse of figures is the report that it costs £1000 per year to maintain one poor-law child from the City of London at the Central London District School.

This statement is true in a sense, though broadly it is untrue. The difference is made by juggling with figures.

This is how it happens. The City of London is very rich, and, quite rightly, its valuable property pays largely to the support of a school which serves a wide district:

On the other hand, the City, which is chiefly occupied by business houses and has but a small population of families, has few children to send to the school.

If, then, the money paid from that particular area is divided between the few children sent to the school from that area, the sum for each looks very large and extravagant, and, seeing the amount, people may exclaim, "What a costly school! How shameful!"

But the great bulk of the children attending the school come from poor districts; and the true way of counting the cost is to divide the total cost of the school by the total children in its charge, and that makes the cost of each child comparatively small. The rich city really helps the poor districts.

The figures in the calculation, considered as figures only, are true; but considered in the light of broad, public duty and genuine humanity are false and misleading, and start untrue talk.

CHILDREN'S NEWSPAPER

APRIL 23 1921

Love Your Neighbour

SOME time ago the British Prime Minister said a thing that deserves to be thought about by every citizen in the land.

It was this: "Love your neighbour" is not merely good, sound Christianity—it is good business.

The business of a large part of the world now seems out of joint, and the beginning and continuation and present confusion of the world's unrest and suffering are all due to the fact that nations and classes of men inside nations, and individuals who are seeking their own advantage, have all failed to realise that to be neighbourly and to care for others is not only right, but is always good business.

Look for a moment at three illustrations of this that are in all our memories.

The Great War itself, out of which so many of our troubles have grown, was started by un-neighbourliness. Far from loving their neighbour nations, as the teaching of Jesus, so true and tender, enjoins, the nations became enemies.

Some of them thought only of themselves, or what they hoped to gain for themselves, and it has been for them a ruinously bad business. Millions have died, and hundreds of millions are suffering and burdened with debt.

While the war was being fought with heroic self-sacrifice by vast numbers, others, of the class called profiteers, had no thought of their fellow-men as neighbours who should be loved, or, at least, should not be wronged. For their own profit they forced up the cost of all necessary things, and supplied goods that became worse and worse in quality as the price rose.

It was bad business, for now they have been marked down as people to be avoided in trade, as selfish and unfair, because bent on seizing every advantage.

But the habit of looking only for selfish advantage, at any cost to others, has spread like a noxious poison, and the country has witnessed with amazement large masses of men, forming whole trades or occupations, employers and employed, seeking their own advantage without caring what harm they cause to larger numbers of people innocent of all thoughts of wrong.

"We for ourselves, and no matter what happens to anybody else," must prove in the end an utterly bad plan. It is not Christian. It is not humane. It is appallingly unjust. And it is bad business, bound to recoil on all who adopt it.

For mankind forms a great brotherhood, whose true prosperity is in helping one another in a spirit of neighbourly love.



THE EDITOR'S TABLE

Fleetway House, Farringdon Street, London
above the hidden waters of the ancient River
Fleet, the cradle of the Journalism of the world



Work for All

NEVER, probably, has there been a time when old-fashioned ideas have crumbled faster than they are crumbling in the present day.

Take, as an instance, one of the oldest. It has been held in this country as a settled thing that people who are proud of their high birth must not do certain kinds of work.

Trade, though to a large extent the world lived by it, was a word of reproach in the mouths of scornful members of the best society.

But that is one of the old-fashioned notions that is mouldering away fast.

Even princes are glad to be in business. A quiet revolution is bringing every one to seek the dignity of a really helpful task, and before very long the meanest dishonour will be to be work-shy.



Disarmament is on the move

Two Village Boys

OUR boys are learning every year more and more how to get things done which they desire. The last proof comes from East Ruston, Norfolk.

In that small village the present Lord Mayor of London was born. Till he was eleven years old he went to the village school, and then left it to be a farmer's boy.

Now that he has prospered and presides over the government of the greatest city in the world he does not forget his village home, but visits it every year and keeps up his boyish friendships. This year he went in his robes of office and unveiled a war memorial cross in the churchyard, for East Ruston knew and did its duty when the nation called for help.

As he was leaving the modern boy, who knows how things are done, put in an appearance. A village lad stepped forward and politely presented to the Lord Mayor a letter, asking him to use his influence to start a Boy Scout troop in the village.

Of course he will do it. A man who can rise from being a farmer's boy to being Lord Mayor of London can do that easily.

It is not what we take, but what we give, that makes us rich.

Past and Present

SIR ARTHUR GORDON, who did such noble work for England in Ceylon, was once taken up into the hills to visit a remote Buddhist monastery seldom shown to Europeans.

In it was preserved in a crystal phial, resting on a golden lotus and covered by a series of caskets richly jewelled, a relic of a bit of one of Buddha's bones.

The caskets were swathed in wrappings. Countless coverings were thus removed—old silk and cotton rags, woollen bandages, tattered chiffons of every description—when, behold! there was exposed a whole layer of red cotton Manchester handkerchiefs, each adorned with the well-known portrait of Mr. Gladstone.

Was it not, asks Sir Arthur Gordon, "an odd jumble of past and present?"

Tip-Cat

THE Premier tells us that all leaders have to take orders. But all the O.B.E.s are not leaders.

DRAUGHT-BOARDS: Window shutters.

THE post-office telegraphs can receive two messages simultaneously. After trying to read some of our telegrams we can readily believe it.

THE Headmaster of Rugby says he is not going to give up the stick.

The boys don't mind, so long as he keeps it to himself.

A HOUSEMASTER: The estate agent.

A MUSICAL critic urges singers not to crane their necks. Then how are they to raise their voices?

"It's no good pulling together," says Mr. Cramp. "We are in a leaky boat." Just the time, at any rate, for pulling yourself together.

Chance Nationality

NATIONALITY, or the country a person belongs to, is the most general cause of pride in the world.

Breathes there a man with soul so dead Who never to himself hath said, "This is my own, my native land"?

And yet to not a few nationality comes, according to the laws of nations, by chance. You belong to the country you are born in, no matter who your parents were; and if they are passing from country to country when you are born, you belong to the country that owns the ship on which you were born.

That is one of the odd rules made by the wise men who make laws.

It is possible for a French infant born on a British ship passing between a French colony and France to be a little Briton by the rules of seafaring till he is old enough to renounce his unwanted country.



PETER PUCK
WANTS
TO KNOW
If schoolboys are
manual workers

The Warriors

ASK what they died for, and their voices toll: For that which was, and is, and is to be—

England that moves through Law to Freedom's goal
Like some deep tide of her safeguarding sea.

ASK whom they trust in, and their souls reply:

In you who follow justice, love, and truth,
You in whose toil our England cannot die,
You in whose longings she renews her youth. H. B.

Human Nature

By Our Country Girl in Town

IT was the dormitory in a working-class hostel. The women were of the poorest kind, chiefly factory hands. A row of camp beds and little lockers ran down the room, with a hat-peg by each. It was sufficient for the belongings of the lodgers.

On one of the beds a young girl lay sobbing her heart out.

The secretary hurried up. What was the matter?

This girl had come down from Scotland last night. There were thirty shillings in her suit-case which she had saved over and above her fare and the price of a week's lodgings. The money was for her grannie, who depended on the eighteen-year-old girl's earnings. It was to earn more for Grannie that Flora had come south.

She had gone out, and on her return found that the cheap suit-case had been broken open—the money was gone.

The young secretary shuddered. But who could find words for the cruelty of this theft? The poor preying on the poor. The secretary said to herself: "Human nature is horrible!"

That evening she met the Scottish girl arm-in-arm with a little Cockney box-maker. Flora's face, still swollen with crying, was bright with smiles. She stopped the secretary and began to declare in broad Scotch that she had never known such fine folk as the Londoners. This so amazed the secretary that she could not follow the dialect further. The Cockney had to translate.

"Y'see, miss, we felt so sorry for the kid that we got up a subscription. We got together two pounds for her grannie."

The two shabby little wage-earners went off together. And the young secretary stood in the corridor thinking, "After all, human nature isn't horrible—it's glorious!"

The Door

The lintel low enough to keep out pomp and pride;
The threshold high enough to turn deceit aside;
The door band strong enough from robbers to defend;
This door will open at a touch to welcome every friend.

HENRY VAN DYKE

PORT DARWIN LONELY OUTPOST OF CIVILISATION Town Named After a Famous Scientist

WHITE MAN'S HOME IN THE TROPICS

By an Australian Correspondent

Port Darwin is vastly interested and slightly amused at the stir caused in Australia by the recent declaration of the Australian Medical Congress that tropical Australia is not uninhabitable.

For more than a generation some thousands of white people and many more thousands of Japanese, Chinese, Malays, and aborigines have been living in and around Darwin, enjoying life to the full.

John Lort Stokes, an Englishman who made some famous voyages in the Beagle, discovered Port Darwin in the forties. He named it after the brilliant, sea-sick young naturalist who had been aboard his vessel from 1831 to 1836 on his famous voyage of scientific survey in South American, Oceanic, and Australian waters, and was to become the most famous scientist of the 19th century.

The outside world first heard of Port Darwin in 1872, when the great Overland Telegraph Line—the O.T.L.—from Adelaide to Port Darwin was completed, and when the North & South Railway was begun 22 years ago there were nearly eight thousand people, not counting the aborigines, in the Northern Territory. Today there are fewer than four thousand, mostly Asiatics, but no more Asiatics are allowed to land in Australia, and before many years the white man will be in sole possession.

Saving Thousands of Miles

Darwin is the natural first port of arrival and the last port of departure for all the big ships trading with the East, and for all the foreign airship trade that must spring up when commercial aviation is put on a firm basis by the Commonwealth Government.

When the North & South Railway from Darwin to Oodnadatta is completed the journey from south to north will be shortened by several thousand miles. The line will run through nearly 200,000 square miles of country with a mean annual rainfall of more than twenty inches.

At Darwin life runs its easy, pleasant, uneventful round. The dry, rainless season lasts from April till October; the hot, wet season from November till March. Except during those five months every day is bright and cloudless, with a cool, bracing sea breeze.

Glorious Land of Trees and Flowers

The nights are cold and blankets often in use. The hot season is stifling, but rain transforms the country into one gorgeous carpet of vivid green. The cool, scented tropical nights, lit by a million stars, are a dream of delight—the only sounds a native corroboree, or distant voices borne along on the dewy wings of night from the dainty pearly luggers out at sea.

The low, green shores are covered with mangroves. Chinese sampans—squat little sailing boats with square ribbed sails—skim over the turquoise sea. Scattered white roofs peep through the mangroves, and the wide red roads, flanked by gorgeous trees and flowering tropical shrubs, are cool and restful. The beaches are fringed with palms.

OUR MEAT SUPPLY Home and Foreign Cattle

To bring one live bullock from America to a British port costs over £20, and the same space that would carry the animal alive will bring seven chilled carcasses.

The number of cattle in England and Wales under one year old in 1920 was nearly 300,000 fewer than in 1910, owing to the slaughtering of calves; but calves are now being reared more freely.

NEWS FROM EVERYWHERE

Japan has just officially adopted the metric system of weights and measures.

Several sheep and lambs have been killed recently by ravens on Exmoor.

A Pink Daffodil

A gold medal has been awarded for a pink daffodil shown at the Royal Horticultural Hall in London.

Signposts in the Air

To guide airmen flying on the Paris to London route the French Government is placing captive balloons in certain positions at a height of about a mile.

Zyxt

The last word in the Great Oxford New English Dictionary, which has taken forty years to complete, has just been written. It is zyxt, which is an old Kentish dialect word for Thou seest.

At Tren-de-Hayes, in Essex, water is sold from a cart at three farthings a pail.

At a Guardian's election in Hackney, London, 98 voters polled out of 10,465.

India's Millions

The census taken in India last March shows the population to be 319 millions as compared with 315 millions in 1911.

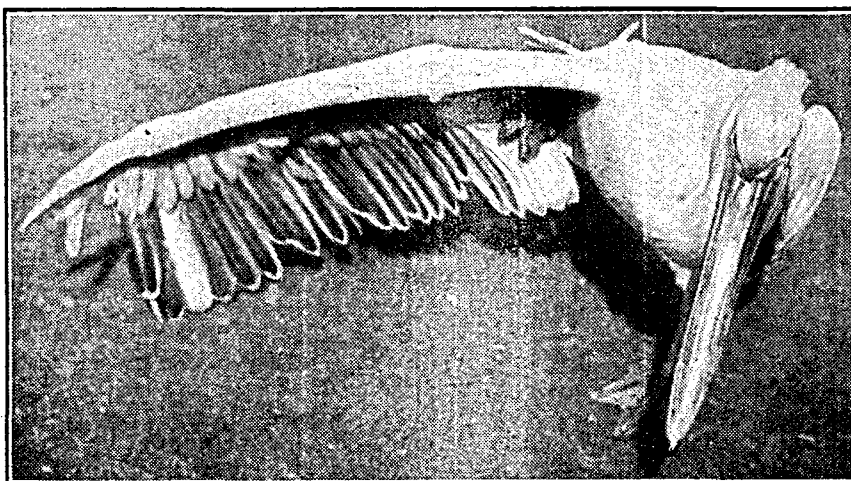
First Working-Man J.P.

Alderman John Potter, who was the very first working man to be appointed a Justice of the Peace in England, has just died at Maidstone, aged 82.

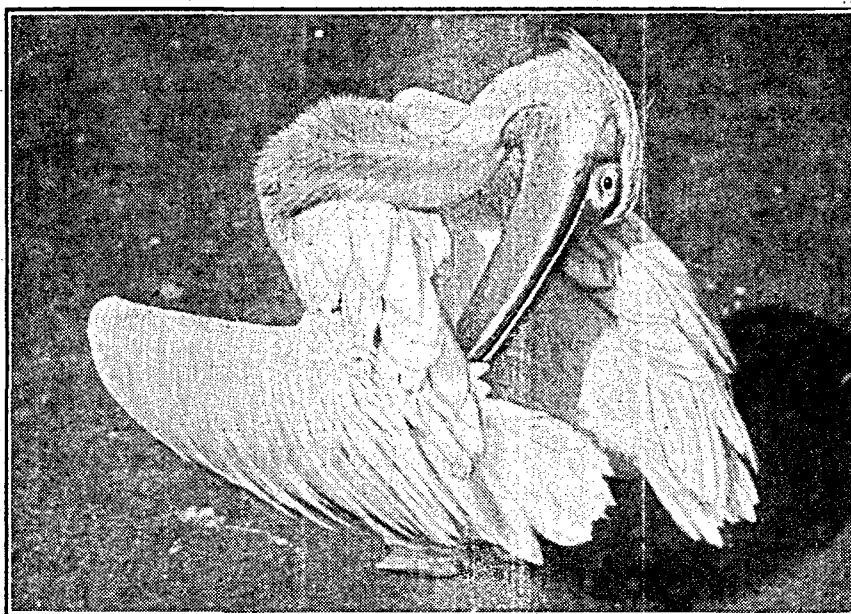
Drought Causes Distress

The prolonged drought in France, though there have been several showers of late, is causing great distress, and on the canal system of Central France all traffic has ceased.

A MORNING WASH AND BRUSH UP



Giving the right wing a good stretch



Putting a finishing touch to the left wing

There is no more interesting and amusing sight in London just now than the pelican in St. James's Park at its toilet. These pictures show the queer contortions that the bird goes through while having an early morning wash and brush up

HOW A LITTLE GIRL WAS HONOURED

It is an honour, surely, for your picture to be passed from hand to hand millions of times throughout a whole country for 85 years.

That is what happened to a little American lassie who was ten years old 85 years ago. Sally Longacre's portrait has been going round and round the American States ever since, and how it all happened is a curious story.

In 1835 the American Government was about to issue a new coin of the value of one cent, or a halfpenny, as we should say. They wanted a coin with an attractive design on it, so they offered an award of a thousand dollars for the best design.

At that time the chief engraver at the American mint in Philadelphia was Mr. James O. Longacre, father of a pretty daughter, Sally.

Just then some American Indian chiefs came out of the West to visit the capital

city, Washington, and to see the President of that day. Then they went on to Philadelphia to see the mint where the money was made, and at Philadelphia they were shown round by Mr. Longacre, while Sally watched with delight the Indian chiefs in the fine head-dresses.

Seeing the child so pleased, one of the chiefs took off his head-dress and put it on Sally's head; and so pretty was the picture she made in it that an artist who was in the company sketched her, and gave the picture to her father.

He was so struck by it that he sent it in for the coin-design competition. The officials who were judges were equally impressed, and not only did Sally's father win the prize, but her face, as sketched by the artist, was engraved on the coin, and wherever a cent has circulated in the States there little Sally Longacre's face has gone.

GREAT FOOD MYSTERY

WHAT ARE VITAMINES?

Problem That Science Has Not Solved

WHY WE SHOULD EAT RAW APPLES

It has just been announced from America that Dr. H. B. Cox, the famous student of physics, has succeeded in capturing the vitamins from vegetables, and has converted them into liquid form.

This is very sensational news, and if correct means a great deal for the future of humanity. But British scientists are inclined to be sceptical, for the astonishing fact is that no chemist, not even Dr. Cox, can tell what vitamins are.

If you look in your dictionary you will not find the word; it is a new word that has been coined in the course of the last year or two.

Admiralty Makes a Discovery

During the war, when men of science were investigating the nature and value of various food substances, they discovered that fresh foods—vegetables, fruits, milk, meat, and so on—contained a mysterious something which these things did not possess in the dried or preserved state.

The British Admiralty had placed large contracts for dried vegetables because it was supposed that these foods when used in soup or moistened with boiling water had all the value of fresh vegetables; but after the scientific discovery referred to the contracts were cancelled, and only fresh vegetables supplied to the men.

The mysterious properties contained in the fresh foods were given the name of vitamins, from the Latin word *vita*, meaning life.

We Must Have Vitamines

All scientists are agreed that a certain proportion of vitamins is absolutely necessary for growth and health. Without vitamins, in fact, we could not go on living for any length of time, and yet, so far, no one is able to say what these mysterious substances are.

British chemists, who are sceptical about Dr. Cox's supposed discoveries, have spent much time and energy in investigating the nature of vitamins, and have divided them into three classes, one kind soluble in fat and two kinds soluble in water.

Vitamins are present in most of the foods that we eat, but are more prominent in fruits and vegetables. Overcooking destroys them, and, in fact, it is said that they cannot exist at temperatures higher than 100 degrees. That is why we should eat a certain proportion of fruits and vegetables raw—apples, oranges, celery, lettuce, and so on. It also explains why dried meats and vegetables and preserved fruits contain no vitamins.

What Happened in India

The seriousness of having an insufficient supply of vitamins is proved by what has happened in India. Under modern conditions rice came to be husked by machinery, and this removed something now recognised as vitamins. The result was the prevalence of the disease known as beri-beri, a form of anaemia and paralysis.

It is the vitamins in lime-juice that prevent scurvy in seamen when fresh vegetables are not available; and children who have an insufficient supply develop rickets and other complaints.

The whole study of vitamins is still in its infancy, but what has already been discovered is exceedingly interesting and important, and proves once more how progressive knowledge is. Until a year or two ago these substances were quite unknown, and now we recognise them as absolutely essential to life.

If Dr. Cox's discovery is confirmed we shall be able to take a spoonful of liquid vitamins whenever we like.

WILL BRITONS GROW SHORTER? A PROBLEM FOR SCIENCE

How France Suffered from Napoleon's Wars KEEPING THE RACE HEALTHY AND STRONG

The effects of war have always been bad long after war has ceased.

They are seen now in poverty, want of good food, and lack of work over a large part of Europe. But will bad effects be seen twenty years hence, when the children of today have become men and women?

This is a question that is being widely asked by men of science, who try to trace effects back to their causes. Will men, for instance, be smaller in the future because of the Great War?

If we look at what has been in order to judge what will be we can see that after the great wars of Napoleon the French nation became smaller in stature.

France was fighting for nearly twenty years between the outbreak of the French Revolution and the final defeat of Napoleon at Waterloo.

Losing Three Inches

All her strong men were forced into the army, and the loss of life was very great, leaving the French a weakened nation. Afterwards, for several generations, the stature of the average Frenchman became less, till he was two or three inches shorter than the average Englishman, Scotchman, or Irishman. Will this effect be seen again after the Great War of 1914-1918?

It is a question that will only be fully answered forty or fifty years from now, when the children of those who are now children are growing into manhood.

No doubt in the countries where there has been a great want of nourishing food bad physical effects will be visible in the future; but there is no great likelihood that the British races will suffer much, though three-quarters of a million of its strongest men were killed. Two reasons may be given for thinking this.

Importance of Good Food

The first is that during the war, though we were all kept on small rations, we were not badly fed. Indeed, many were better fed than in times of peace, for the means to buy food were spread widely over the country.

Then, also, many who joined the army were exceptionally well fed and well trained physically, so that their health was improved.

These advantages will probably help to counteract the weakening of our race by wounds and illness, and its weakening by the loss of so many strong, brave men.

But, looking round at all the nations, it is quite clear that the bad physical effects of the war will not disappear for at least fifty years.

That is one of the sad results that should make all of us enemies of war.

COIN THAT RINGS A BELL

Calling a Taxi-Cab by Machine

Everybody knows the difficulty we sometimes have in getting a cab.

Most cab-shelters in big cities are on the telephone, but it is not always convenient to call a cab by telephone. A big Continental city has set about solving the problem in a new way, so sensible that it is to be hoped it will be copied in every large town.

Penny-in-the-slot machines are installed at several points, and to call a cab one has only to put a coin in the slot and wait for the cab. The coin, once dropped into the machine, sets a bell ringing at the nearest cab-rank, and as soon as a cab is available it is sent to the spot where the machine is installed.

Brave Little Nation of the North

FINLAND, THE LAND OF HEROES & HEROINES

People Who Lost Their Independence and Fought a Bloodless Fight to Win It Back

STRANGE WEAPONS AN ENGLISHMAN SAW

BY OUR INTERNATIONAL CORRESPONDENT

While many parts of Europe continue in a state of restlessness after the war, one of the small new countries has settled down into prosperous work with sound good sense. That country is Finland. It is well worth our attention.

If you look at a large map of Finland you will see that a great many names of places in that country end in joki, pronounced ioki, jarvi, pronounced iarvi, and koski. And when you learn that the first of these endings stands for river, the second for lake, and the third for waterfall, you will guess that Finland is a very watery country.

As one looks out of the carriage windows when travelling through it by train it seems to consist almost entirely of water, poor soil, and fir trees. When one knows it better one finds that, though the soil is poor, the Finns, by their industry and intelligent methods, make it yield enough rye to provide them with bread—for very few of them eat wheat bread, as we do—and graze enough cows on it in summer to give them great quantities of milk, which they turn into butter and send across the sea to other lands.

Using the Forest and Waterfall

The Finns use the force of their waterfalls to turn their spruce fir trees into pulp and paper. This is their chief industry. Nature gave them these sources of wealth; their enterprise and cleverness are making their country one of the chief producers of paper, which all the world needs in such large quantities, especially for newspapers.

In addition to all their fresh water they have a long sea-coast, and they are a salt water people.

Finnish sailors are found on ships in all parts of the globe. Many of them serve in British vessels. Ship-masters are glad to employ them because, though they are inclined to be brusque, even surly, in manner, and are by nature independent, always ready to stick up for their rights, they have a strong sense of responsibility, and are conscientious in the discharge of their duties.

Nation that Loves to Learn

Finnish sailors are also welcomed on board ship because, as a rule, they are sober men. For fifty years Finns have been taught that spirits are bad for them. The consequence of this is that the number of distilleries in Finland is only thirty, and seldom is anyone seen the worse for drink.

No people is more anxious to learn and to profit by education. They understand the value of it, and after they have gone to work most of them attend classes of some kind.

Many take advantage of the winter schools. Their northern winter is long and very hard. For six months the land is covered by snow. Many occupations, such as building, are interrupted. This gives to numbers of young men and women who are eager to exercise their minds opportunity to go to school again. They can live at the winter schools and receive instruction for about 30s. a month.

The Finns were badly treated by the Russian Tsars. Early in the nineteenth century they were granted the right to govern themselves, though they always had a governor-general appointed by the Tsar.

They had formerly been under the rule of the Kings of Sweden. Russia defeated Sweden in war and took Finland away. Even a hundred years ago the Finns were able and anxious to govern themselves, and for a long time they did so with success.

But the Tsar's evil counsellors persuaded him to break the promise that his ancestor had made to Finland. Its constitution was suspended; and the Tsar sent a governor named Bobrikoff to break the spirit of the Finns.

Finland's Mighty Arsenal

He might as well have tried to conquer the power of the ocean. When Bobrikoff walked out of his palace in Helsingfors all Finns crossed the road as soon as they saw him coming, and left him on his side of the pavement alone.

The women wore black as a sign of mourning for their stolen rights. To a concert given for some charity Bobrikoff's name was lent as patron. Finns bought nearly all the tickets—and tore them up! The concert hall was empty except for a few Russians!

It was quite certain that so small a people—there are only three or four millions of them—could not hope to regain their independence by fighting the huge Russian Empire. So they set to work to make ready other weapons than rifles and cannon.

A Finnish schoolmaster in a small place asked an Englishman if he would like to see their arsenal. The Englishman was astonished that there should be one. He went with the schoolmaster and was shown the boys and girls going into school.

People With a Difficult Tongue

"Those are our guns; that is our arsenal," the schoolmaster said. "Our weapons are civilisation, humanity, progress. They are certain to gain a victory some day over the forces of reaction, tyranny, and barbarism, which Russia employs."

Now that victory has been won, Finland is free and independent.

The Finns do not call their country Finland. They call it Suomi, as you can see by their postage stamps.

Their language is unlike any other in Europe, and difficult to learn. They are not by descent a European race; they came from Asia. Like the Chinese, Finnish men are smooth-faced, with little hair on cheeks or chin. Their eyes are slightly slanting, their cheekbones are high. The Magyars of Hungary and the Lapps belong to the same family as the Finns.

Among their good qualities are honesty and cleanliness. Every week Finns go into a steam bath, which cleans the skin more thoroughly than water.

No people better deserve self-government or are likely to make such good use of it.

MOCK MOONS SEEN FROM LONDON

An Interesting Sight at Midnight

COLOURS CAUSED BY ICE CRYSTALS

A week or two ago we gave an account of the striking solar halos which a Folkestone reader had seen at nine o'clock on a February morning.

Now a London reader of the C.N., Mr. J. W. Wilson of Forest Hill, writes to say that he recently saw at midnight, while gazing at the heavens through a telescope, a corresponding phenomenon with the moon as its centre.

What looked like a small cloud had been stationary on one side of the moon for quite half an hour, and our reader and a friend then noticed that there was a similar cloud-like object at an equal distance on the opposite side of the moon, and, further, that the moon was encircled by a large, misty halo.

"It then dawned on me," he says, "that the cloud-like objects were mock moons, or paraselenes, as they are called. They were situated horizontally on each side of the moon, and each looked like an elongated misty patch with a brighter nucleus in the centre. The lunar halo extended nearly to Saturn on one side and Arcturus on the other. This is the first time that I have seen mock moons, though lunar halos are quite common when the moon is seen through very thin clouds."

Rare Sight at Liverpool

The appearance of mock moons is, of course, due to exactly the same cause as the mock suns—namely, the presence of minute crystals of snow or ice high up in the atmosphere, which refract, or break up, the light, and then reflect it.

This interesting phenomenon takes a variety of forms. One seen at Liverpool about ten o'clock at night had a wide halo, exhibiting the colours of the rainbow, part of the circumference being cut off by the horizon.

The circular band was intersected by two small segments of a larger circle, which, if completed, would have passed through the moon. These segments were of a paler colour than the first-mentioned circle. At the points of intersection appeared pretty, well-defined, luminous discs, equalling the moon in size, but less brilliant.

The western mock moon had a tail, directed away from the moon, and the eastern disc had also a tail, but less defined. Such phenomena are well worth looking out for.

DUCKS HELP THEIR FRIENDS

Geese Driven Away

A reader living in Rumania sends us the following observation of the ways of ducks and geese in that Danubian land.

Two ducks arrived in our poultry yard, and after a while the geese came up, as I supposed, to attack them, but all the other ducks surrounded them to protect them.

As the geese went away the ducks set up a great quacking, and then waddled off with their new friends into the bushes. When they came out of the bushes afterwards it was curious to notice their order. The old ducks came first, and last of all came the new arrivals.

COUNTING THE CROPS

How Rome Gathers the News

From time to time the newspapers publish estimates of crops of all kinds that are being grown in the world.

The news of the crops of about 40 countries is sent to an international institute at Rome, managed by a committee representing all the nations.

It is from these reports of the agriculture of the whole world that the amount of food likely to reach the world's markets is estimated yearly.

THE WEEK IN NATURE

Queen Wasps Fly in the Open

SWALLOWS INVADE THE NORTH

By Our Country Correspondent

April 24. The swallow, which arrived a week or two ago in the South of England, has been gradually travelling north, and has now reached Scotland, so that it has taken possession of the whole of our island. It loves human habitations, and is always found in villages and round farmhouses and other country homes. There it will remain till the end of September.

April 25. On any sunny day now we may see a solitary queen wasp busily engaged excavating a passage in a bank, preparatory to forming a nest and rearing a family. These female wasps are the only survivors of last year's broods, and they have remained in a dormant state all through the winter, but have now awakened to activity.

April 26. Everywhere the birds are busy completing their nests or laying their eggs, and before long the stock dove, thrush, and long-tailed titmouse, all of which are now laying, will have their little families to care for.

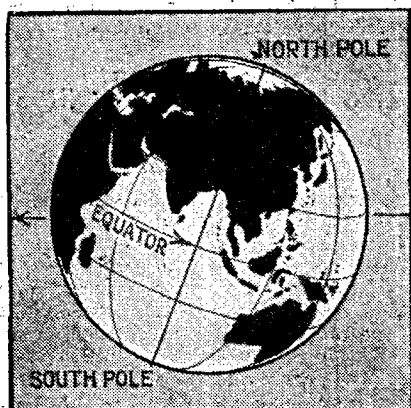
April 27. Slugs are slippery, slimy creatures which are by many people regarded as peculiarly unattractive. Nevertheless, they are very interesting, and when, after a sharp rain at this season, we see a slug or two appearing in the open it is well worth while to have a little patience and watch their habits.

April 28. "O to be in England now that April's there!" wrote Robert Browning, and he added: "While the chaffinch sings on the orchard bough." This bird is one of the most popular of all our songsters, and at the present time it is building its nest of moss or lichen, lined with hair and feathers, in the fork of some old tree or in a thick hedge.

April 29. The burying beetle, that wonderful little digger that can perform such marvels and bury such large creatures compared with its own size, is now appearing in many places. You can recognise it by its deep shining black body, with the three last joints of the antennae a reddish yellow.

April 30. The pert little redbreast is now a proud mother with a lively little family, and the hedge sparrow and moorhen have also hatched their eggs.

THE EARTH SEEN FROM THE SUN



This is how the earth would appear to you at 6 a.m. on any day in April if you could see it through a telescope from the sun. Of course, the lines of latitude and longitude would not appear; they are put in to show the tilt.

NEXT WEEK IN THE GARDEN

Sow successional batches of turnips, and hoe and thin out plants already up. If new plantations of rhubarb are required, divide the roots, leaving two or three crowns on each plant, and remove the flower-stems when seed is not to be saved.

Sow seeds of thyme in light soil, or propagate by division. Sow seeds of sweet marjoram in a warm border, and make successional sowings of round-leaved spinach.

Keep the edges of the spring beds trimmed, and clear off decayed leaves.

WEALTH FROM WASTE

OVER £40,000 FROM SWEEPINGS AND RUBBISH

How Plenty was Obtained in a Time of Scarcity

LEARNING A LESSON FROM NATURE

It has just been announced that a profit of £42,813 has been made for the State by the National Waste Products, an organisation set up by the Government to recover useful materials from all kinds of refuse.

Formerly the sweepings from barrack-room floors and food products that had gone bad—bacon, beans, condensed milk, chocolate, dried fruits, biscuits, and so on—were destroyed, but when the great shortage of materials came in the early days of the war clever men set to work to see what could be obtained from refuse and rubbish.

Scraps That Fall From the Table

They soon found that valuable fats, glycerine, pig and poultry food, and useful fertilisers could be made from kitchen waste, and the result of their efforts is shown in this profit of £42,813, which is a net profit made in addition to the cost of the plant and machinery laid down, which was all paid for out of the sales of the useful products recovered from the waste.

The systematic collection of table scraps and floor sweepings in camps and barracks goes on, and the work of reclaiming what is of value in these things is being continued by private corporations and by municipal bodies.

The abundance that existed in the days before the war led to a great deal of wastefulness. A church dignitary, speaking on this subject in 1916, said: "I have travelled all over the world and I have never known any nation or people so wilfully wasteful as people of our own country. In no other country do people so absolutely fling away God's gifts as they do in England."

Something Useful in Everything

That indictment was probably true, but if the terrible events of the past few years have done nothing else they have, at any rate, taught us to avoid waste and make the very best use of even the most unlikely materials. It is amazing what is done in this way nowadays. Here are a few striking instances of how wealth is obtained from waste:

Lubricating oil is reclaimed from the old rags with which engineers clean their hands and machinery. These rags were formerly burnt; now both oil and rags are used again.

Fat is extracted from offal and kitchen grease; linoleum is made from cork cuttings; new glass is made from old broken bottles and window panes; glue is made from clippings of hide and skins; gas is made from plumstones and wood shavings; fertilisers are made from hair and feather waste.

Nature Never Wastes

In all this we are following the ways of Nature, who never really wastes anything.

As Lord Leverhulme has said: "Nature knows no waste. The dust blown from the high-road settles in the nooks and crannies of walls and rocks, and is there capable of nourishing growing plants which, in turn, yield fruit or herbs for the use of men or creatures. The surplus yield of seeds not required for new repetitions of plants, trees, or vegetables is not wasted; it is food for man or creatures. Mankind are the only wasters, and our greatest wastes are those of time, opportunity, health, and life."

Let us, at any rate, see to it that we are not among the wasters of the world's wealth, but among those who create and build up fresh wealth for the future.

C.N. QUESTION BOX

Little Puzzles in Natural History

Answered by Our Natural Historian

All questions must be asked on postcards, and not more than one question on each card

How Many Legs Has a Fly?

Six. The front pair exercise a pulling action in walking; the second and hind pair push.

Will a Double-Yolked Egg Produce Two Birds?

No. The life-germ is not in the yolk. The yolk is the substance which feeds the chick before it is hatched.

What Do Newts Live On?

Various insects, centipedes, worms, snails, slugs. Like frogs, they swallow worms of seemingly excessive size.

Do Blackbeetles Hibernates?

No; the domestic blackbeetle, whose proper name is cockroach, dies in cold weather unless it has the artificial heat of a house to sustain it.

Does the Lark Fly Higher than any other Bird?

No; poetic fancy has taught us to picture the lark as singing "at heaven's gate," but the height to which he flies is excelled by that of birds of prey.

Is the Tomato a Fruit or a Vegetable?

Strictly speaking, the tomato is a fruit, but fruit according to botanical classification often has a very different meaning from that which we imply when we think of dessert.

Why are Moths Attracted by Artificial Light?

They are not actually attracted; they fly toward the light because they are temporarily incapable of seeing anything outside its radius. Birds are similarly affected at night when near lighthouses.

Why Do Cobwebs Glisten With Colour?

A closer examination of such webs would doubtless reveal the presence of dewdrops, or of hoar-frost thawed to moisture. Each bead of fluid reflects the sunlight and yields the charming effect described.

Can Plants Feel?

Yes; they respond to external influences, science finds, as certainly as lowly forms of animal life. But the feeling of a plant is a vastly different matter to the feeling of a child or one of the more highly organised creatures of the lower creation.

Why Does a Rabbit's Fur Come Out?

The hair of all hairy and furry animals comes out in the process known as casting the coat. The old hair dies and falls off and new hair takes its place. Birds moult their feathers, snakes slough their skins, crabs and lobsters cast their shells.

Which Air-Breathing Animal Can Stay Longest Under Water?

The great sperm whale, though it may come up to breathe frequently when near the surface, can stay under water quite fifty minutes when it dives deep. A hippopotamus must raise its nostrils into the air at the end of ten minutes' immersion.

How Can the White Fungus Disease of Gold Fish be Cured?

The Board of Agriculture and Fisheries published a prescription some years ago, but it was a matter of applying a portion of poison to millions of times that poison's volume of water—an altogether too delicate calculation for young people. The writer knows no other remedy, and, for his own part, would destroy the fish affected to prevent their infecting others.

Do Ants March in Armies?

Yes; some of the foreign ants march for miles in armies several hundred yards long and move at the rate of a yard a minute. Some graphic and interesting particulars about this are given in an article, called *The Marvellous Things the Insects Do*, in *My Magazine*, the mother of the C.N., for May, now lying on the bookstalls.

THE LITTLE KING IN THE SKY

CONSTELLATION OF THE LION

Light that Takes a Century to Reach Us

A FAR-OFF SOLAR SYSTEM

By Our Astronomical Correspondent

The constellation of Leo, the Lion, is now the finest group in the heavens.

It is easily found very high up in the south after dark, and Jupiter, now by far the brightest object in the evening sky, is on its confines, as shown in the accompanying star map.

It is owing to his presence and Saturn's that Leo makes at present a finer display than even glorious Orion, which is now low down in the west.

As will be noticed, Leo shows a remarkable geometrical arrangement, Saturn, Jupiter, and Regulus, its chief star, away to the right, being in a straight line, with the other brightest stars of Leo grouped above them in a striking design easy to remember.

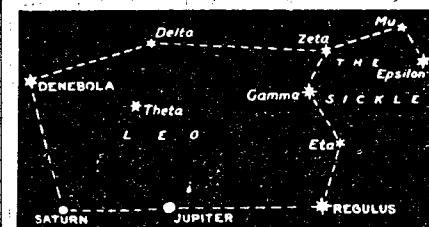
The planets Jupiter and Saturn have been described in the C.N. recently, so it is with the stars of the Lion that we are now particularly concerned.

The Star of the King

Regulus, or Alpha Leonis, as it is sometimes called, is the first in rank of all Leo's stars, and, indeed, of all the stars in the sky, according to the ancients, for, as its name signifies, it is the regal star, or little king. It was called Rex in Roman times, and on the ancient Babylonian inscriptions, probably as old as Abraham, Regulus was known as the Star of the King.

Although Regulus looks much smaller than Jupiter and no brighter than Saturn, it is some hundreds of thousands of times larger.

Its light has been calculated to be between 260 and 500 times greater than that of our Sun, and our Sun is



The Constellation of Leo

nearly 1000 times the size of Jupiter, while Jupiter is 1309 times the size of the Earth. From this interesting calculation it will be seen that Regulus is between 338 million and 650 million times the size of our world—that is, assuming that the size of Regulus is in proportion to its light, which seems highly probable.

The reason it appears so small in comparison with Jupiter is because of its great distance. Jupiter is about 450 million miles away at present, and light takes 40 minutes to reach us from him; but it takes nearly 99 years—or close upon a century—to come from Regulus.

Star's Fiery Satellites

Now, the number of times 40 minutes will go into 99 years is the number of times Regulus is beyond Jupiter, and this number, when found, will, if multiplied by 450 million, give the number of miles Regulus is from us.

Regulus is known to have a great fiery world that accompanies it through space. This gives about four-fifths the light of our Sun, so that it is a veritable sun in itself; and it has, in turn, another much smaller body, a sort of fiery satellite, such as our Moon was once, revolving round it; but it is visible only through powerful telescopes.

This far-off solar system is speeding through space at 36 miles a second, about twice as fast as the Earth and our solar system; yet so far off is it that for hundreds of years Regulus has appeared to remain in very much the same place.

G. F. M.

A MESSAGE FROM SPACE

A Thrilling Story of Flying Adventures
Telling How Mars Saved the Earth

Told by
GEORGE
GOODCHILD

What Has Happened Before

Tom Breckneck, a boy of 16, and his sister Joan, a girl of 12, live with their father in Devon.

Tom goes into the garden and finds his sister crying over a dead bird that has been shot by an older lad named Rolf Chudd. Tom is furious with the youth and fights him, but they are stopped by his adversary's sister, Ida Chudd.

Mr. Breckneck dies suddenly and Tom joins an engineering works where his uncle, Robert Breckneck, is building a great airship.

Six months later the Dragon-Fly—as its owner, Lord Parry, has christened the ship—is nearing completion when the workmen in the hangar suddenly strike, demanding the reinstatement of a man named Murphy who has been dismissed for intemperance.

That evening Tom is standing at his window looking out over the aerodrome when he is startled by seeing a tongue of flame in the direction of the hangar. Telephoning to Lord Parry, he takes his uncle's car and drives at once toward the increasing glare.

CHAPTER 9

Tom Speaks out

THE little car snorted and groaned as it took the winding road at full speed. Tom clutched the steering wheel for dear life, and avoided disaster a dozen times.

As he mounted the hill the glare of the fire became brighter, until the blazing shed came into full view. With his heart in his mouth he drove straight for the wide entrance of the aerodrome, and dashed across the level track until the car was within a hundred yards of the conflagration.

He pulled it up with a jerk and leapt from it.

Four men were dragging two hoses into action, grunting and perspiring under the weight of their long lengths. He recognised them in the glare of the leaping flames. They were Blundell, the chief engineer, and his trio of loyal colleagues who had refused to strike.

Blundell gave him a glance of recognition, and then inclined his smoke-begrimed head toward a group of figures in the distance.

"Look at them," he cried fiercely, "watching while the work of their hands goes up in smoke!"

"Who did it?" gasped Tom.

"I don't know. I wish I did. I feel like murder!"

Great jets of water suddenly spurted from the two hoses. The nozzles were inclined at a steep angle to reach the high altitude of the roof, and a hissing was added to the sullen roar of the flames and the crackle of wood. But it was like stopping a forest fire with the aid of a penny squirt.

Quickly the fire spread from the rear end forward. Half-choked with the smoke, the four men moved nearer to allow the full force of the water to come into effect. Tom staggered back under a deluge of sparks.

"It's awful," he groaned. "Are there any more hoses?"

"There are twenty-four, and hydrants in plenty all round the aerodrome. We could stop it yet if the men would only help, but they won't. Don't come too near. I'm afraid of the explosion when the ship ignites!"

It certainly looked as though the Dragon-Fly were doomed. Higher and higher the flames leapt, roaring and crackling and hissing as though they took intense delight in their work of destruction.

Tom looked back at the crowd of watchers, and fierce anger burned within him at the thought

of their indifference. Half-blinded he staggered up to Blundell.

"Is it gaining?" he asked, in a hoarse voice.

"Yes. Two hoses are no good—it wants twenty. In less than fifteen minutes the fire will be inside, and then—"

"Have you sent for the fire brigade?"

"Yes. But it'll be half an hour before the first engine can get here. It's no use. We're done."

Who had done this thing? It was abominable! If the airship were destroyed, what would his uncle's feelings be to realise that all the precious hours of thought and work were gone in smoke? And then there was Lord Parry, who had spent half his fortune on this adventure, and Henderson—

Most of all Tom was sorry for Henderson, who had created this wonderful vessel of the clouds from his fertile imagination. It was as though a beautiful young bird were being burned to death before his eyes. And men could sit and watch!

He splashed through the mud and water towards the watchers, whose faces were now clearly illuminated by the glare. In the forefront was a brawny pleasant-faced man who seemed to be a leader. Tom turned to him.

"Are you going to stand and see the airship burned to atoms?" he demanded passionately.

The big man stared at him.

"We are on strike," he replied gruffly. "We're waiting to hear the result of the meeting at the governor's house."

"In a few minutes the result of the meeting won't matter at all. What is the use of winning the strike if the airship is gone?"

This seemed to have some effect, but a vicious-looking man from behind growled:

"Who's this kid talking? A strike's a strike, and the ship can burn to ashes as far as I'm concerned."

Tom turned on him angrily.

"I don't know who you are, but you're no engineer. Any man with an atom of love for his work wouldn't be content to see it destroyed before his eyes."

The sour-faced man made a threatening movement, but the first speaker interposed.

"That's enough, Murphy!" he growled.

Murphy! Tom remembered the name. It was the name of the man who had been discharged, the man who was the cause of all the trouble.

But there was no time to be lost. Every minute was precious. He gained courage by the knowledge of what was at stake.

"Look here," he shouted to the crowd generally. "When I first saw the airship I thought it was the most wonderful thing ever built. I thought that every man who had put his work into it was proud of it, as he had a right to be. Now I find it was all wrong, that you didn't care, and that you have no pride in your skill; that you are not really engineers at all, but merely bits of machinery without a soul!"

It was an extraordinary thing for a boy like Tom to say to a group of grown-up men, and it had peculiar results. Some of them resented it, and were on the point of forcibly expressing this fact upon the impetuous Tom. Murphy glared at him with derisive malice, and caught him by the shoulder; but the big foreman pushed him away.

"Hold up, mates!" he shouted. "The boy's right!"

"Yah, blackleg!" screamed Murphy.

"Blackleg yourself! A strike may be a strike, but I'll be hanged

before I see that ship a heap of rubbish. Where are you going to get another ship like it—eh? Come on! Who'll give a hand? We can settle the strike later."

Half a dozen men, who from the first had watched the fire in mental torture, pushed forward to him.

"I'm with you, Jim!"

"Me, too!"

"And me!"

Enthusiasm once stirred, the rest followed, only the scowling Murphy staying behind.

CHAPTER 10

A Mystery Solved

JIM, the foreman, got to work like the leader he was. In two minutes he had disposed of all the men to their various posts. Hoses were soon attached to the hydrants, and the burning hangar was ringed round with enthusiastic workers. It was a competition among them who should get his hose into action first. Tom threw in his lot with Jim.

One after another the hoses came into play. A deluge of gleaming water thundered all over the hangar. It ran down in vast streams over the field.

For one instant the fire broke through a section of the roof.

"Concentrate!" bellowed Jim; and a score of jets converged to the spot and beat the flames out.

Slowly the fire began to abate.

"We're winning!" gasped Tom.

"We are!" chuckled Jim.

A cheer came from the other side of the hangar, as the last flame was doused there. Blundell grinned as he saw Tom dragging the hose nearer.

"How did you manage it, youngster?" he asked.

"Common sense," replied Jim.

Not a single particle of flame remained now. A great cloud of steam ascended from the charred hangar, but they still continued to pour on tons and tons of water. Eventually, when all danger of a further outbreak was removed, Blundell gave the signal to desist. A motor-car came splashing across the soaked ground, and Robert Breckneck and Lord Parry alighted and ran forward.

"The airship?" gasped Parry.

"Safe, sir," said Blundell.

"Thank heavens!"

"Better thank this young chap," muttered Jim. "He made us pretty well ashamed of ourselves."

Robert, after holding a brief conversation with Blundell, came up to Tom.

"Thanks," he said simply, extending his hand.

"What about the meeting?" queried Tom. "Is the strike over?"

"I'm afraid not. We can't consent to reinstate Murphy."

Tom's face fell. He had hoped there would have been some way out of it without reinstating the scoundrelly Murphy. The men gathered in knots to talk over the position, while Parry and Robert went inside the hangar to ascertain that all the damage was confined to the exterior.

"How did it start?" asked Tom of Blundell.

"Can't tell. But it was no accident."

The big electric cable was soon repaired, and the arc lamps inside and outside the aerodrome lighted. Tom wandered round the hangar, surveying the damage. He noticed that the fire had apparently started in the rear of the building, for the damage near the rear end was much worse than anywhere else.

He was about to go back and join the others when his eye lighted on an object a few yards from the scene of the fire's origin. He stooped and picked it up. It was a smoker's pipe of very unusual design.

Excited at his discovery, he ran back to Blundell.

"I found this," he said, "near where the fire started. Do you know whose it is?"

Blundell exhibited great interest. He shook his head.

"That's very queer," he said. "Where's the foreman?"

Jim was arguing the point with the men who had comprised the delegation. They still adhered to their demands—Murphy must be reinstated before they would resume work. Blundell came forward and called Jim aside.

"Have you ever seen this pipe before?" he asked.

Jim took it and looked at it.

"Yes. That's Murphy's."

"Ah, then perhaps Murphy will explain how it got to the end of the hangar—where the fire started."

The significance of these words was not lost. Jim looked black. He turned to the little crowd beyond.

"Murphy!"

Murphy came slouching forward. "Where were you when the fire started?"

The abrupt question startled Murphy.

"At home, of course!" he snarled. "I saw the flames and ran down."

"And you haven't been at the aerodrome all day, eh?"

"No, I haven't. Not since they sacked me."

An ugly look came into Jim's eyes. He held up the pipe.

"Then how came this at the rear end of the hangar—where the fire started—when I saw you smoking it at four o'clock this afternoon?"

He held the pipe under the nose of the astonished Murphy, who had been too busy gloating over the fire to become aware of its loss.

Murphy went red, and saw danger in the eyes of the disgusted men. He tried to bluster and slink away, but strong hands caught him and held him back. Jim, noticing the neck of a large bottle protruding from his pocket, pulled it out. Something about the bottle interested him. He withdrew the cork and smelt it.

"Petrol!" he ejaculated.

There remained small doubt as to where the contents had gone. The charred hangar was evidence.

Murphy no longer tried to bluster. He knew it would be useless in the face of this condemning evidence. He suddenly kicked out and ran for his life. The crowd followed him, and hounded him from the aerodrome and from their midst for ever. They believed in fair play, and this certainly was not fair play. They held a meeting among themselves, and then the men who had formed the delegation found Lord Parry.

"The strike's over," they informed him. "Murphy was a scoundrel. We want to get to work and finish the ship."

TO BE CONTINUED



It is packed with just the kind of merry stories and jolly pictures every boy and girl likes. Each week there is a Toy Model, a New Game, and an interesting talk on "Things to Make" which tells you how to make your own toys.

Buy a copy TODAY

PUCK—2

PRINTED IN COLOURS

Out on Thursday

Five-Minute Story

The Bell of Justice

UNDER the kindly rule of John of Atri his people were remarkably happy.

They were Italian hill folk, whose strong city rises between the mountains and the Adriatic Sea, and they went in no fear of enemies outside their land or of unjust men within their gates, for on the upland common, where poor peasants pasture their cattle, John of Atri built a tower and hung a bell in it.

A rope dangled by the doorway, and any person suffering any kind of wrong had but to ring the bell of justice in order to have his case immediately heard. From the old and wisest townsmen Duke John had chosen a council of justice that assembled as soon as the bell rung and gave sentence.

After some years of this quick and ready sort of judgment the work of the council seemed to have ended. There was no need for anybody to ring the bell of justice. Its mere existence was sufficient to keep men and women fair and neighbourly.

One day a herdsboy saw that the free end of the bell-rope had frayed away and broken off.

"This won't do!" he said. "Nobody could ring the bell of justice if they wanted to."

So he made a temporary repair, by tying a length of wild green vine to the broken end.

Half an hour later the councillors of Atri were surprised by a long and urgent summons to do justice. Louder and louder rang the bell as they were putting on their gowns. Leaving their suppers unfinished, they walked to the Tower of Justice, and the curious, eager townfolk streamed along with them.

A roar of laughter came from the children and men who ran first to the tower. An old, hollow-ribbed horse was reared against the building and, with outstretched neck, was eating the last bit of vine within its reach.

Some of the councillors, thinking they had been made fools of, were turning home, but they were called back by the oldest men.

"The bell of justice has been rung," said a white-haired councillor solemnly, "and neither by beast nor man shall it be rung in vain. Form the court!"

People dwelling by the common were called as witnesses for the horse. They said the animal had been the charger of a knight of Atri, who turned him loose upon the common land to save expense in feeding him when he became too aged for service.

Thereupon the good councillors gave judgment that the horse had just reason for ringing the bell of justice, and that the knight whom he had nobly served while he had strength should feed him in his old age.

Duke John, a great lover of horses, not only confirmed the sentence but added a heavy penalty upon the knight.

April 23, 1921

The Children's Newspaper

II

Down Our Glad Gardens Light Winds Play

DR. MERRYMAN

A FARMER walking in his garden saw his gardener asleep in an arbour.

"What," cried the farmer, shaking the man, "asleep instead of at work! You idle fellow, you are not worthy that the sun should shine on you."

"I am fully aware of my unworthiness," said the gardener; "that is why I placed myself in the shade."

A Heavy Bill

THERE once was a lively toucan With a bill as large as a man; The weight of his bill Made him hot, tired, and ill, So he cooled it by using a fan.

WHAT was the biggest moth in the world? The mammoth.

The Correction

A NEWSPAPER published a reference to "her Grace the Duke of Dorset," and the next day corrected it in this way, "For her Grace the Duke of Dorset read his Grace the Duchess of Dorset."

A Mysterious Notice

AN antiquarian found this inscription on a post in an old-world village:

KEEP
PONT
HIS
SIDE

It was some time before he realised that it was a direction to keep on this side of the fence.

Transposition

AN insect that is small in size Will make a very dismal sound If, after you have read it once, You simply turn the word around. One letter, please, now cast away, Transpose the whole of what remains, Another insect, smaller still, Will stand and greet you for your pains.



Adventures of Augustus & Marmaduke
AUGUSTUS and young Marmaduke Were walking hand in hand, When down the street the other day There came the village band.

"Let's throw this ball and break their drum," That naughty Marmy said.

He threw the ball; the drum he missed, And hit the drummer's head. Both his sticks the drummer took And beat those naughty boys; And louder than the beat of drums Was Gus and Marmy's noise. At every beat they gave a scream, But all their cries were vain. At drummers in the village band They won't throw balls again.

Do You Live In Jewin Street?
SUCH names as Jewin Street, Old Jewry, and so on, found in London and some other ancient towns, mark the sites of what were the quarters occupied by the Jews or their burial places in the Middle Ages.

What is Wrong in This Picture?



Something has been purposely drawn wrong in this picture. Can you see what it is?
Solution next week

WHAT is the difference between a burglar and a wig? One has false keys and the other has false locks.

The Voyage of the Bogey

BROLLIGOBOND was a bogey, The brother of Mulberry Bee; And he sailed the American Tom-berry Boll In a tumbler of bilberry tea.

His sails were of plum-coloured satin,

His masts were a lucifer match; And he sailed the American Tom-berry Boll

Till he came to the shores of the Skratsch.

He squelched in the mud of the Eesby Oosh,

And plundered the juniper-tree, The strawberry beds, and the bar-berry boosh, In the garden of Mulberry Bee.

Then he skipped down the beach in the moonlight,

With a handful of berries, and laughed,

And he sailed the American Tom-berry Boll

In his silvery, bilberry craft.

WHEN is coffee like earth? When it is ground.

Johnny and the Apples

JOHNNY came away from an orchard laden with apples, and met a friend who asked him for half his apples and half an apple. He gave them to him.

Farther down the road he met another friend who asked him for half the apples in his possession and half an apple. Again Johnny acceded to the request.

When he was accosted a third time and asked for half his apples and half an apple Johnny began to regret that he was so good-natured, although he did as he was asked.

He eventually reached home and had three apples in his possession. How many did he have when he left the orchard?

Answers next week

ANSWERS TO LAST WEEK'S PUZZLES

A Mystery

The figure 8 divided horizontally gives us two noughts, and divided perpendicularly down the middle the right half is three.

Buried Proverb

Faint heart never won fair lady.

What Birds Are These?

Bullfinch and crossbill.

What Are They Doing?

One boy was pulling a garden roller and the other was playing leap-frog.

Who Was She?

The lively girl was Jane Austen.

Jacko Makes Himself Useful

THE boys at Jacko's school were very excited.

"Heard the news?" they said, when Jacko appeared. "Teacher's going off on a jury, and we're to have a holiday."

"Hurroo!" shouted Jacko, flinging his cap into the air. It landed, unfortunately, on the master's head.

"Now, boys," he said irritably. "Don't crowd round and make a hubbub. Get your home-work and be off with you!"

Poor Teacher! He wasn't at all pleased at being summoned to town; and as he very seldom travelled by train he was rather fluttered at the prospect.

The boys were still swarming round the door when he came out, a little later, with his hat on and his bag in his hand.

"I'll carry your bag, sir," said Jacko, running forward.

"Eh? What?" said the master.

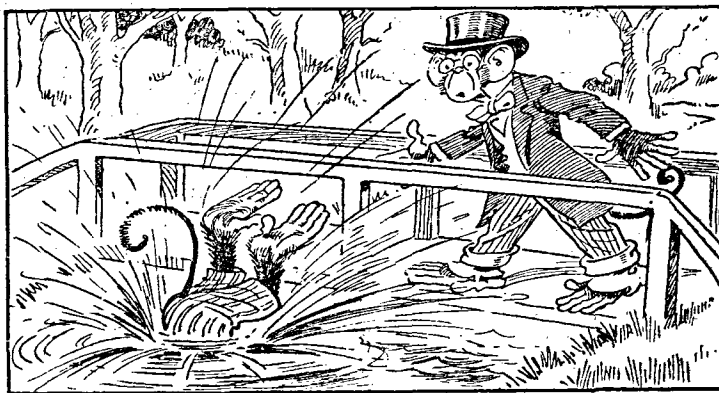
But Jacko had got hold of the bag and was dashing off with it at fifty miles an hour. He swung it cheerfully, as he went, keeping time with the tune he was whistling.

"Hi! Stop!" shouted the master suddenly, hurrying after him. "Just look what you're doing."

Jacko looked—and stopped whistling.

"Sorry, sir," he said. "I'll soon pick 'em up again"—for the bag had flown open and the things were scattered all over the road.

They bumped heads more than once collecting them, but they got them together at last and started off again.



Splash! Master Jacko had followed the bag

But when Jacko put out his hand for the bag the master refused to part with it.

"No, thank you," he said firmly. "You mean well, my lad, but I've no time to lose."

Jacko looked distinctly injured.

"Can't you lock it?" he suggested.

They were crossing a bridge as he spoke. The master smiled good-naturedly, rested the bag on the side, and felt in his pocket for the key.

He pulled it out and pushed it in the lock. It stuck fast.

"This bag hasn't been used for some time," he said. "I expect the lock's rusty."

"Let me have a shot," said Jacko, pushing forward.

But he couldn't turn it either. He tried and tried, and at last in his impatience he gave it such a jerk that it shot out of his hand—*splash!*

"Oh, my hat!" said Jacko. "Half a minute. I think I can reach it"—it was a low bridge and a very shallow stream.

"Take care!" cried the master.

But that was a thing Jacko had never done. He leaned a bit too far—and *splash!* Master Jacko had followed the bag!

He was out again as soon as he was in.

"What a joke!" he shouted, shrieking with laughter.

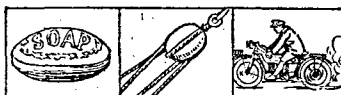
"Joke!" echoed his master. "You've lost me my train and ruined my things. What you deserve is a good thrashing. Get out of my sight, or you'll get it!"

Ici on Parle Français



Un étrier La tortue La grille

On met le pied dans l'étrier
La tortue avance lentement
Il y a une grille autour du parc



Le savon La poulie La motocyclette

Nous nous lavons avec du savon
La poulie sert à hisser la voile
La motocyclette va très vite

Notes and Queries

Who was the Merry Monarch?
Charles the Second.

What is an Alumnus? This word, which comes from a Latin verb meaning to nourish, is used sometimes for a pupil or the graduate of a college or university.

What is a Civil Day? A day of exactly 24 hours, which has been adopted as a convenient measurement in social and business life.

What is the Vulgate? A translation of the Bible made in the fourth century into Latin, which was the vulgar, or common, tongue of the Romans.

Tales Before Bedtime

The Book

DAN was in a great hurry.

He ran as long as he could, and then, when his legs began to ache and his breath began to come in little jerks, he tucked the book he was carrying under his arm, and hurried on as fast as he could manage.

You see, Uncle Eliot, who was just back from India and about whom he had heard such wonderful tales, was coming that afternoon. So it was most unfortunate that Mrs. Charrington should choose that very day to ask Dan to carry a book to old Saddler, who was laid up with rheumatism.

When Dan would have asked "Will tomorrow do?" the thought of the lonely old postman stopped him.

"Poor old man!" Mrs. Charrington said. "He's very dull. It will cheer him up to see your rosy face."

Old Saddler lived at the other end of the village. He and Dan were great friends, and at any other time Dan would have jumped at the chance of a chat with him.

He fetched his hat and went straight off, hoping that if he hurried he would still be back in time to see his hero.

Old Saddler was indeed pleased to see him. He gave him a warm welcome, and insisted that he must stay to tea.

And, as Dan didn't know how to refuse without hurting his feelings, he stopped.

He sat and drank his tea and talked politely, but all the



Dan was in a great hurry

time he was thinking: "I shall never do it. He'll be gone—I know he will!"

Suddenly a motor-horn blew outside. A car stopped, and out sprang a big man.

He strode up to the open window, and asked if anyone could tell him which was Dr. Stanley's house.

"I can!" cried Dan, jumping up. "He's my father!"

The big man stared. "Then you must be Dan," he said slowly.

"And you—oh! Are you Uncle Eliot?" cried Dan.

He was. And, of course, the rest is easily guessed. Dan finished his tea at a gulp, and he and his hero went home in the car together.

The Children's Newspaper grows out of My Magazine, the monthly the whole world loves. My Magazine grew out of the Children's Encyclopedia, the greatest book for children in the world. The Magazine appears on the 15th of each month, and the Editor's address is: Arthur Mee, Fleetway House, Farringdon St., London, E.C. 4.

CHILDRENS NEWSPAPER

April 23, 1921

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PONY BORN IN A MINE • PEER STOKER • COMFORT ON AN AIRSHIP



The Sea Lion Laughs at the World—No matter what the troubles of the world may be the sea lion at the London Zoo smiles and enjoys himself, as seen here



Goat Outwits the Cattle—This goat, which found the attentions of the cattle in Windsor Great Park rather too pressing, was clever enough to squeeze through the railings of the tree guard and thus reach safety. The oxen seem to recognise that they are beaten



Pony Born in a Coal-Mine—This little pony born in a pit, would have grown up underground if the strike had not come. See page one



Peer Keeps the Fires Burning—Lord Bledisloe, who is 54, stoked the furnaces at a Gloucestershire colliery to keep the pumps working



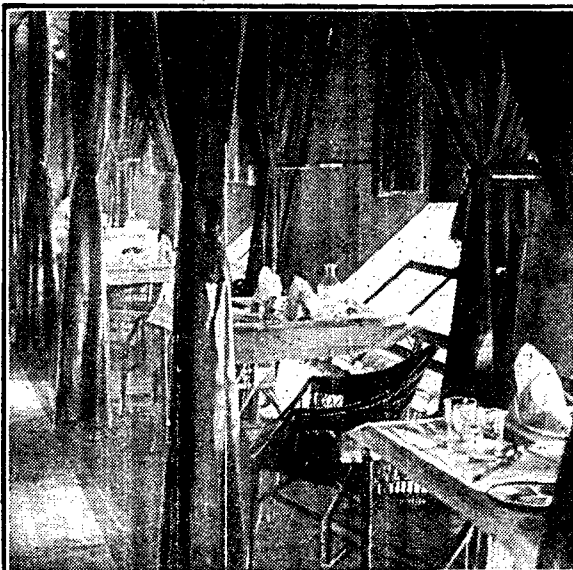
Dog Helps His Little Mistress in the Garden—We are all attending to our lawns just now, cutting the grass and using the roller, and this little girl, with the aid of her pet, who seems to be enjoying the fun, is trying to roll the lawn of her father's garden



Workers Entering the Big Airship—These work-girls are seen going into the gondola of the new airship R 36 to put the finishing touches



An Exciting Moment on the Thames—The Upper Thames Sailing Club has just held its races on the Thames at Teddington, and, as shown by this picture of the Viva tacking, very skilful sailing is necessary on these inland waters



Comfort on an Airship—These are the cabins on the new commercial airship R 36, which recently made a trial flight, and passed over London. The cabins are adapted for sleeping, and there is plenty of room on board, with many comforts



Bringing Home a Load of Coal—These boys and girls have just been overhauling a slag heap near a coal mine, and are bringing home their finds of black diamonds in case of a shortage occurring later on